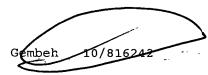
inventor search



=> fil medl druqu ipa wpix biosis embase; d que l14; fil capl; d que l1 FILE 'MEDLINE' ENTERED AT 12:16:27 ON 10 AUG 2006

FILE 'DRUGU' ENTERED AT 12:16:27 ON 10 AUG 2006 COPYRIGHT (C) 2006 THE THOMSON CORPORATION

FILE 'IPA' ENTERED AT 12:16:27 ON 10 AUG 2006 Copyright (c) 2006 The Thomson Corporation

FILE 'WPIX' ENTERED AT 12:16:27 ON 10 AUG 2006 COPYRIGHT (C) 2006 THE THOMSON CORPORATION

FILE 'BIOSIS' ENTERED AT 12:16:27 ON 10 AUG 2006 Copyright (c) 2006 The Thomson Corporation

FILE 'EMBASE' ENTERED AT 12:16:27 ON 10 AUG 2006

Copyright (c) 2006 Elsevier B.V. All rights reserved.

L9	44	SEA	FREDDO J?/AU
L10		_	HU LOWE D?/AU OR HULOWE D?/AU OR LOWE D?/AU
L11	81	SEA	KERSI PITHAVALA Y?/AU OR PITHAVALA Y?/AU
L12			STEINFELDT H?/AU
L14	13	SEA	(L9 AND (L10 OR L11 OR L12)) OR (L10 AND (L11 OR L12)) OR
		(1.11	1 AND 1.12)

FILE 'CAPLUS' ENTERED AT 12:16:28 ON 10 AUG 2006 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2006 AMERICAN CHEMICAL SOCIETY (ACS)

Copyright of the articles to which records in this database refer is held by the publishers listed in the PUBLISHER (PB) field (available for records published or updated in Chemical Abstracts after December 26, 1996), unless otherwise indicated in the original publications. The CA Lexicon is the copyrighted intellectual property of the American Chemical Society and is provided to assist you in searching databases on STN. Any dissemination, distribution, copying, or storing of this information, without the prior written consent of CAS, is strictly prohibited.

FILE COVERS 1907 - 10 Aug 2006 VOL 145 ISS 7 FILE LAST UPDATED: 9 Aug 2006 (20060809/ED)

Effective October 17, 2005, revised CAS Information Use Policies apply. They are available for your review at:

http://www.cas.org/infopolicy.html 'OBI' IS DEFAULT SEARCH FIELD FOR 'CAPLUS' FILE

1 SEA FILE=CAPLUS ABB=ON US2004-816242/AP T<sub>2</sub>1

=> dup rem 11,114 FILE 'CAPLUS' ENTERED AT 12:16:38 ON 10 AUG 2006 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. Gembeh 10/816242 - Page 2

PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2006 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'MEDLINE' ENTERED AT 12:16:38 ON 10 AUG 2006

FILE 'DRUGU' ENTERED AT 12:16:38 ON 10 AUG 2006 COPYRIGHT (C) 2006 THE THOMSON CORPORATION

FILE 'WPIX' ENTERED AT 12:16:38 ON 10 AUG 2006 COPYRIGHT (C) 2006 THE THOMSON CORPORATION

FILE 'BIOSIS' ENTERED AT 12:16:38 ON 10 AUG 2006 Copyright (c) 2006 The Thomson Corporation

FILE 'EMBASE' ENTERED AT 12:16:38 ON 10 AUG 2006
Copyright (c) 2006 Elsevier B.V. All rights reserved.
PROCESSING COMPLETED FOR L1
PROCESSING COMPLETED FOR L14
L15 9 DUP REM L1 L14 (5 DUPLICATES REMOVED)
ANSWER '1' FROM FILE CAPLUS

ANSWER '1' FROM FILE CAPLUS
ANSWERS '2-4' FROM FILE MEDLINE
ANSWERS '5-8' FROM FILE DRUGU
ANSWER '9' FROM FILE BIOSIS

=> d ibib ed abs 1; d iall 2-9

L15 ANSWER 1 OF 9 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 3

ACCESSION NUMBER: 2004:857398 CAPLUS

DOCUMENT NUMBER: 141:337772

TITLE: Pharmaceutical dosage forms comprising AG 013736 INVENTOR(S): Freddo, James Lawrence; Hu-Lowe, Dana; Pithavala,

Yazdi Kersi; Steinfeldt, Heidi Marie

PATENT ASSIGNEE(S): Pfizer Inc., USA

SOURCE: PCT Int. Appl., 35 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT NO.		KIND		APPLICATION NO.	
		A1		WO 2004-IB867	
				BA, BB, BG, BR, BW,	
•		•		DM, DZ, EC, EE, EG,	
•		•		IN, IS, JP, KE, KG,	
				MD, MG, MK, MN, MW,	
•		•		RO, RU, SC, SD, SE,	
•				UG, US, UZ, VC, VN,	
•					
·		-		SD, SL, SZ, TZ, UG,	
BY,	KG, KZ,	MD, R	U, TJ, TM,	AT, BE, BG, CH, CY,	CZ, DE, DK, EE,
ES,	FI, FR,	GB, G	R, HU, IE,	IT, LU, MC, NL, PL,	PT, RO, SE, SI,
SK,	TR, BF,	BJ, C	F, CG, CI,	CM, GA, GN, GQ, GW,	ML, MR, NE, SN,
TD,	TG				
AU 20042265	86	A1	20041014	AU 2004-226586	20040317
				CA 2004-2520932	
				EP 2004-721255	
R: AT.	BE. CH.	DE. D	K. ES. FR.	GB, GR, IT, LI, LU,	NL. SE. MC. PT.
·				CY, AL, TR, BG, CZ,	
·				BR 2004-9230	

US 2004224988	<b>A</b> 1	20041111	US 2004-81624:	2	20040401 <
NL 1025873	A1	20041005	NL 2004-10258	73	20040402
NL 1025873	C2	20060214			
NO 2005005143	Α	20060103	NO 2005-5143		20051102
PRIORITY APPLN. INFO.:			US 2003-46069	5P P	20030403
			US 2003-49177	lP P	20030731
			WO 2004-IB867	A	20040317

ED Entered STN: 18 Oct 2004

AB The invention provides pharmaceutical dosage forms of AG 013736 or salts, solvates or prodrugs. The invention further provides methods of treating abnormal cell growth, such as cancers, by administering the dosage forms to a mammal. A high-dose combination therapy of AG 013736 ad docetaxel generates greater delay of primary tumor growth and metastasis than either monotherapy alone.

REFERENCE COUNT: 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L15 ANSWER 2 OF 9 MEDLINE on STN DUPLICATE 1

ACCESSION NUMBER: 2006347111 IN-PROCESS

DOCUMENT NUMBER: PubMed ID: 16332390

TITLE: The anti-angiogenesis agent, AG-013736, has minimal

activity in elderly patients with poor prognosis acute myeloid leukemia (AML) or myelodysplastic syndrome (MDS). Giles Francis J; Bellamy William T; Estrov Zeev; O'Brien

AUTHOR: Giles Francis J; Bellamy William T; Estrov Zeev; O'Brien Susan M; Verstovsek Srdan; Ravandi Farhad; Beran Miloslav;

Bycott Paul; Pithavala Yazdi; Steinfeldt

Heidi; Reich Steven D; List Alan F; Yee Karen W L

CORPORATE SOURCE: Department of Leukemia, University of Texas M.D. Anderson

Cancer Center, 1515 Holcombe Boulevard, Box 428, Houston,

TX 77030, USA.. frankgiles@aol.com

SOURCE: Leukemia research, (2006 Jul) Vol. 30, No. 7, pp. 801-11.

Electronic Publication: 2005-12-05.
Journal code: 7706787. ISSN: 0145-2126.

PUB. COUNTRY: England: United Kingdom

DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)

LANGUAGE: English

FILE SEGMENT: NONMEDLINE; IN-PROCESS; NONINDEXED; Priority Journals

ENTRY DATE: Entered STN: 9 Jun 2006

Last Updated on STN: 19 Jul 2006

## ABSTRACT:

AG-013736 is an oral anti-angiogenesis agent with activity against a variety of receptor tyrosine kinases, including VEGFR-1, VEGFR-2, VEGFR-3, c-kit, and PDGFR-beta. A phase 2 study was conducted in patients with poor prognosis AML or MDS. Twelve patients (six AML; six MDS) were treated with AG-013736 at a dose of 10mg orally daily for a median of 56 days (range, 1-248 days). Median age was 80 years (range, 58-88 years). Grade 3 or 4 drug-related toxicities included hypertension (42%), mucositis (8%) and deep venous thrombosis (8%). No objective responses occurred; two patients with MDS had stable disease for 8.3 and 6.2 months, respectively. Bone marrow expression of VEGFR-1 and VEGFR-2 was observed in 11% and 0% of patients, respectively. Sustained decreases in soluble VEGFR-2 plasma levels with concomitant elevation in plasma VEGF and placental growth factor levels were obtained during the course of therapy with AG-013736. AG-01736 had minimal biologic or clinical activity in this elderly patient population.

L15 ANSWER 3 OF 9 MEDLINE on STN DUPLICATE 2 ACCESSION NUMBER: 2005442884 MEDLINE

Gembeh 10/816242

Page 4

DOCUMENT NUMBER: PubMed ID: 16027439

Phase I trial of the oral antiangiogenesis agent AG-013736 TITLE:

in patients with advanced solid tumors: pharmacokinetic and

clinical results.

Rugo Hope S; Herbst Roy S; Liu Glenn; Park John W; Kies AUTHOR:

> Merrill S; Steinfeldt Heidi M; Pithavala Yazdi K; Reich Steven D; Freddo James L;

Wilding George

University of California, San Francisco Comprehensive CORPORATE SOURCE:

Cancer Center, USA.

Journal of clinical oncology: official journal of the American Society of Clinical Oncology, (2005 Aug 20) Vol.

23, No. 24, pp. 5474-83. Electronic Publication:

2005-07-18.

Journal code: 8309333. ISSN: 0732-183X.

Comment in: J Clin Oncol. 2005 Aug 20;23(24):5417-9. PubMed COMMENT:

ID: 16027435

PUB. COUNTRY: DOCUMENT TYPE: United States (CLINICAL TRIAL)

(CLINICAL TRIAL, PHASE I)

Journal; Article; (JOURNAL ARTICLE)

(MULTICENTER STUDY)

LANGUAGE:

SOURCE:

English

FILE SEGMENT:

Priority Journals

ENTRY MONTH:

200509

ENTRY DATE:

Entered STN: 20 Aug 2005

Last Updated on STN: 24 Sep 2005 Entered Medline: 23 Sep 2005

#### ABSTRACT:

PURPOSE: We studied the safety, clinical activity, and pharmacokinetics (PK) of AG-013736, an oral receptor tyrosine kinase inhibitor of vascular endothelial cell growth factor, platelet-derived growth factor, and c-Kit, in patients with advanced cancer. PATIENTS AND METHODS: Patients received fixed doses of AG-013736 orally in 28-day cycles. In the first cohort, patients initially received two single test doses of AG-013736 (10 and 30 mg); subsequent dosing was determined by individual PK parameters. Doses in subsequent cohorts were assigned by using a traditional dose-escalation/de-escalation rule based on observed toxicities in the current and previous cohorts. PK analysis included evaluation of the effect of food and antacid. RESULTS: Thirty-six patients received AG-013736 at doses ranging from 5 to 30 mg by mouth twice daily. dose-limiting toxicities observed included hypertension, hemoptysis, and stomatitis and were seen primarily at the higher dose levels. The observed hypertension was manageable with medication. Stomatitis was generally tolerable and managed by dose reduction or drug holidays. AG-013736 was absorbed rapidly, with peak plasma concentrations observed within 2 to 6 hours after dosing. The maximum-tolerated dose and recommended phase II dose of AG-013736 is 5 mg, twice daily, administered in the fasted state. No significant drug interaction with antacid was seen. There were three confirmed partial responses and other evidence of clinical activity. CONCLUSION: In this study, we have demonstrated clinical activity and safety of AG-013736 in patients with advanced solid tumors and identified the dose for phase II testing. The unique phase I study design allowed early identification of important absorption and metabolic issues critical to phase II testing of this agent.

CONTROLLED TERM:

Check Tags: Female; Male Administration, Oral

Adult Aged

\*Angiogenesis Inhibitors: AD, administration & dosage

Angiogenesis Inhibitors: AE, adverse effects

\*Angiogenesis Inhibitors: PK, pharmacokinetics

Area Under Curve

Drug Administration Schedule

Drug Interactions

Humans

\*Indazoles: AD, administration & dosage

Indazoles: AE, adverse effects
\*Indazoles: PK, pharmacokinetics

Maximum Tolerated Dose

Middle Aged

Neoplasms: BL, blood

\*Neoplasms: DT, drug therapy

\*Neovascularization, Pathologic: DT, drug therapy

Research Support, Non-U.S. Gov't

Treatment Outcome

CHEMICAL NAME: 0 (Angiogenesis Inhibitors); 0 (Indazoles); 0 (axitinib)

L15 ANSWER 4 OF 9 MEDLINE on STN ACCESSION NUMBER: 2005442885 MEDLINE

DOCUMENT NUMBER: PubMed ID: 16027440

TITLE: Dynamic contrast-enhanced magnetic resonance imaging as a pharmacodynamic measure of response after acute dosing of

AG-013736, an oral angiogenesis inhibitor, in patients with

advanced solid tumors: results from a phase I study.

AUTHOR: Liu Glenn; Rugo Hope S; Wilding George; McShane Teresa M;

Evelhoch Jeffrey L; Ng Chaan; Jackson Edward; Kelcz Frederick; Yeh Benjamin M; Lee Fred T Jr; Charnsangavej

Chusilp; Park John W; Ashton Edward A; Steinfeldt

Heidi M; Pithavala Yazdi K; Reich Steven D;

Herbst Roy S

CORPORATE SOURCE: University of Wisconsin Comprehensive Cancer Center,

Madison, WI, USA.

SOURCE: Journal of clinical oncology : official journal of the

American Society of Clinical Oncology, (2005 Aug 20) Vol.

23, No. 24, pp. 5464-73. Electronic Publication:

2005-07-18.

Journal code: 8309333. ISSN: 0732-183X.

COMMENT: Comment in: J Clin Oncol. 2005 Aug 20;23(24):5417-9. PubMed

ID: 16027435

PUB. COUNTRY: United States
DOCUMENT TYPE: (CLINICAL TRIAL)

(CLINICAL TRIAL, PHASE I)

Journal; Article; (JOURNAL ARTICLE)

(MULTICENTER STUDY)

LANGUAGE: English

FILE SEGMENT: Priority Journals

ENTRY MONTH: 200509

ENTRY DATE: Entered STN: 20 Aug 2005

Last Updated on STN: 24 Sep 2005 Entered Medline: 23 Sep 2005

ABSTRACT:

PURPOSE: Identifying suitable markers of biologic activity is important when assessing novel compounds such as angiogenesis inhibitors to optimize the dose and schedule of therapy. Here we present the pharmacodynamic response to acute dosing of AG-013736 measured by dynamic contrast-enhanced magnetic resonance imaging (DCE-MRI). PATIENTS AND METHODS: Thirty-six patients with advanced solid tumors were treated with various doses of AG-013736. In addition to standard measures of objective disease response and pharmacokinetic analysis, DCE-MRI scans were acquired at baseline and repeated at cycle 1--day 2 after the scheduled morning dose of the AG-013736 in 26 patients. Indicators of a

vascular response, such as the volume transfer constant (K(trans)) and initial area under the curve (IAUC), were calculated to assess the effect of treatment on tumor vascular function. RESULTS: Evaluable vascular response data were obtained in 17 (65%) of 26 patients. A linear correlation was found in which the percentage change from baseline to day 2 in K(trans) and IAUC was inversely proportional to AG-013736 exposure. Using a conservative a priori assumption that a > or = 50% decrease in K(trans) was indicative of an objective vascular response, a 50% decrease in K(trans) was achieved and corresponded to a plasma AUC(0-24) of > 200 ng . h/mL. CONCLUSION: A sufficient decrease in tumor vascular parameters was observed at a dose chosen for additional phase II testing by conventional toxicity criteria. In addition, the day 2 vascular response measured using DCE-MRI seems to be a useful indicator of drug pharmacology, and additional research is needed to determine if it is a suitable marker for predicting clinical activity.

Check Tags: Female; Male CONTROLLED TERM:

Administration, Oral

Adult Aged

\*Angiogenesis Inhibitors: AD, administration & dosage

Angiogenesis Inhibitors: PK, pharmacokinetics

Area Under Curve

Contrast Media: AD, administration & dosage

Drug Administration Schedule

Gadolinium DTPA: DU, diagnostic use

Humans

\*Magnetic Resonance Imaging

Middle Aged

Neoplasms: BL, blood

\*Neoplasms: DT, drug therapy \*Neovascularization, Pathologic: DT, drug therapy Predictive Value of Tests

Research Support, Non-U.S. Gov't

Treatment Outcome

CAS REGISTRY NO.: 80529-93-7 (Gadolinium DTPA)

CHEMICAL NAME: 0 (Angiogenesis Inhibitors); 0 (Contrast Media)

ANSWER 5 OF 9 DRUGU COPYRIGHT 2006 THE THOMSON CORP on STN DUPLICATE 4

ACCESSION NUMBER: 2005-22995 DRUGU T S

TITLE: Phase 2 study of the anti-angiogenesis agent AG-013736 in

patients with poor prognosis acute myeloid leukemia (AML) or

myelodysplastic syndrome (MDS).

**AUTHOR:** Giles F J; Steinfeldt H; Bellamy W T; Bycott P;

Pithavala Y; Reich S D; List A F

CORPORATE SOURCE: Univ. Texas-Syst.; Pfizer; Univ. Arizona; H. Lee-Moffitt-Cancer-

Cent.

Houston, TX, San Diego, CA, Tucson, AZ; Tampa, FL, USA Blood (104, No. 11, Pt. 1, 502a, 2004) LOCATION:

SOURCE: ISSN: 0006-4971 CODEN: BLOOAW

AVAIL. OF DOC.: Leukemia, MD Anderson, Houston, TX, U.S.A.

LANGUAGE: English DOCUMENT TYPE: Journal

## ABSTRACT:

A Phase II study of p.o. AG-013736 in 12 elderly patients with poor prognosis acute myeloid leukemia (AML) or myelodysplastic syndrome (MDS) is reported. Side-effects included hypertension, mucositis, DVT, hoarseness, proteinuria and diarrhea. There were no responses. AG-013736 was well tolerated and further trials in combination with other treatment are considered warranted. (conference paper: 46th Annual Meeting of the American Society of Hematology,

San Diego, California, USA, December 4-7, 2004).

SECTION HEADING: T Therapeutics

S Adverse Effects

CLASSIF. CODE:

35 Adverse Reactions

51 Chemotherapy - clinical

64 Clinical Trials73 Trial Preparations

CONTROLLED TERM:

[01]

AG-013736 \*TR; AG-013736 \*AE; DR0068539 \*RN; ACUTE \*TR;
MYELOID \*TR; LEUKEMIA \*TR; PRELEUKEMIA \*TR; HYPERTENSION \*AE;
DIARRHEA \*AE; MUCOSITIS \*AE; PROTEINURIA \*AE; HOARSENESS \*AE;
DEEP \*AE; VEIN \*AE; THROMBOSIS \*AE; LYMPHOPROLIFERATIVEDISEASE \*TR; MARROW-DISEASE \*TR; VASCULAR-DISEASE \*AE;
GASTROENTEROPATHY \*AE; ORL-DISEASE \*AE; CASES \*FT; IN-VIVO
\*FT; PHASE-II \*FT; CYTOSTATIC \*FT; P.O. \*FT; GERIATRICS \*FT;
ANGLOGENESIS THURBITORS \*FT; CYTOSTATICS \*FT; TRIAL PREP

ANGIOGENESIS-INHIBITORS \*FT; CYTOSTATICS \*FT; TRIAL-PREP. \*FT; TYROSINE-KINASE-INHIBITORS \*FT; CLIN.TRIAL \*FT; TR \*FT;

AE \*FT

FIELD AVAIL.:

AB; LA; CT

FILE SEGMENT: Literature

L15 ANSWER 6 OF 9 DRUGU COPYRIGHT 2006 THE THOMSON CORP on STN

ACCESSION NUMBER: 2005-32469 DRUGU P

TITLE:

PK/PD modeling based on mouse xenograft tumor growth inhibition and the correlation to clinical exposure for VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736.

AUTHOR: Yamazaki S; Grazzini M L; Romero D; Amundson K;

Pithavala Y; Hu Lowe D D

CORPORATE SOURCE: Pfizer

LOCATION:

San Diego, CA, USA

SOURCE:

Proc.Am.Assoc.Cancer Res. (96 Meet., 3003, 2005) ISSN:

0197-016X

AVAIL. OF DOC.:

Pfizer Global Research and Development, San Diego, CA, U.S.A.

LANGUAGE:

English

DOCUMENT TYPE:

Journal

## ABSTRACT:

This pharmacokinetic (PK)/pharmacodynamic (PD) study was carried out in mice (bearing human colon carcinoma MV522 tumors) that were treated with various concentrations of p.o. or infused AG-013736. Based on clinical PK parameters and parameters from mouse PK/PD modeling, human PK/PD simulation was performed to investigate clinical dose projection. This line of research emphasizes the complexity of PK/PD modeling and the necessity of understanding and conducting the appropriate preclinical PK/PD studies in order to better aid clinical dose projection for the development of anti-cancer agents. (conference abstract: 96th Annual Meeting of the American Association for Cancer Research, Anaheim, California, USA, April 16-20, 2005).

SECTION HEADING: P Pharmacology

CLASSIF. CODE:

8 Pharmacokinetics

52 Chemotherapy - non-clinical

73 Trial Preparations

CONTROLLED TERM:

[01]

AG-013736 \*DM; AG-013736 \*PH; COLON \*OC; INTESTINE \*OC;

GASTROENTEROPATHY \*OC; CARCINOMA \*OC; ANIMAL-NEOPLASM \*OC; DR0068539 \*RN; IN-VIVO \*FT; MOUSE \*FT; CYTOSTATIC \*FT; P.O. \*FT; INFUSION \*FT; BLOOD-PLASMA \*FT; CONC. \*FT; HALF-LIFE \*FT; BIOAVAILABILITY \*FT; LAB.ANIMAL \*FT; INJECTION \*FT;

PHARMACOKINETICS \*FT; ANGIOGENESIS-INHIBITORS \*FT;

CYTOSTATICS \*FT; TRIAL-PREP. \*FT; TYROSINE-KINASE-INHIBITORS

\*FT; VEGF-ANTAGONISTS \*FT; DM \*FT; PH \*FT

FIELD AVAIL.:

AB; LA; CT Literature

FILE SEGMENT:

ANSWER 7 OF 9 DRUGU COPYRIGHT 2006 THE THOMSON CORP on STN ACCESSION NUMBER: 2005-25224 DRUGU TPS

TITLE:

Clinical and dynamic imaging results of the first phase I study of AG-013736, an oral anti-angiogenesis agent, in

patients (pts) with advanced solid tumors.

AUTHOR:

Rugo H S; Herbst R S; Liu G; Park J W; Kies M S;

Pithavala Y K; McShane T M; Steinfeldt H M;

Reich S D; Wilding G

CORPORATE SOURCE: Univ.California; Univ.Texas; Univ.Wisconsin; Pfizer San Francisco; La Jolla, CA, Houston, TX, Madison, WI; LOCATION:

Groton, CT, USA

SOURCE:

J.Clin.Oncol. (22, No. 14, Suppl., 2503, 2004)

ISSN: 0732-183X CODEN: JCONDN

AVAIL. OF DOC.: DOCUMENT TYPE:

University of California, San Francisco, California, U.S.A.

LANGUAGE:

English Journal

## ABSTRACT:

The pharmacokinetics, safety and efficacy of p.o. AG-013736 was investigated in a phase I study of 36 patients with advanced solid tumors. The maximum tolerated dose of AG-013736 was 5 mg, b.i.d., with dose-limiting toxicities of hypertension, hepatopathy, thrombosis, pancreatitis and stomatitis. Results demonstrate the promising anticancer activity of AG-013736. (conference abstract: 40th Annual Meeting of the American Society of Clinical Oncology, New Orleans, Louisiana, USA, June 5-8, 2004).

T Therapeutics SECTION HEADING:

P Pharmacology

S Adverse Effects

CLASSIF. CODE:

8 Pharmacokinetics 35 Adverse Reactions

51 Chemotherapy - clinical

64 Clinical Trials 73 Trial Preparations

## CONTROLLED TERM:

[01]

AG-013736 \*TR; AG-013736 \*AE; AG-013736 \*DM; DR0068539 \*RN; MAMMA \*TR; MAMMA-DISEASE \*TR; THYROID \*TR; THYROID-DISEASE \*TR; KIDNEY \*TR; NEPHROPATHY \*TR; LUNG \*TR; PNEUMOPATHY \*TR; CARCINOMA \*TR; HYPERTENSION \*AE; HEPATOPATHY \*AE; THROMBOSIS \*AE; PANCREATITIS \*AE; STOMATITIS \*AE; NEOPLASM \*TR;

VASCULAR-DISEASE \*AE; PANCREOPATHY \*AE; STOMATOLOGY \*AE; IN-VIVO \*FT; CASES \*FT; PHASE-I \*FT; P.O. \*FT; DOSAGE \*FT; CYTOSTATIC \*FT; BLOOD-PLASMA \*FT; CONC. \*FT; HALF-LIFE \*FT; BIOAVAILABILITY \*FT; TRIAL-PREP. \*FT; ANGIOGENESIS-INHIBITORS

\*FT; TYROSINE-KINASE-INHIBITORS \*FT; CYTOSTATICS \*FT;

CLIN.TRIAL \*FT; PHARMACOKINETICS \*FT; TR \*FT; AE \*FT; DM \*FT

FIELD AVAIL .: AB; LA; CT FILE SEGMENT: Literature

L15 ANSWER 8 OF 9 DRUGU COPYRIGHT 2006 THE THOMSON CORP on STN

ACCESSION NUMBER: 2004-41475 DRUGU T P S

TITLE: A phase I study of the VEGF/PDGF receptor tyrosine kinase

inhibitor AG-013736 in patients with advanced solid tumors:

Safety, pharmacokinetics and dceMRI.

AUTHOR: Herbst R; Rugo H; Liu G; Park J; Kies M; Pithavala Y

; McShane T; Evelhoch J; Steinfeldt H; Reich S;

Freddo J; Wilding G

CORPORATE SOURCE: Univ. Texas-Syst.; Univ. California; Univ. Wisconsin; Pfizer

LOCATION: Houston, Tex., San Francisco; San Diego, Cal., Madison, Wis.;

Groton, Conn., USA

SOURCE: Clin.Cancer Res. (9, No. 16, Pt. 2, 6265S, 2003) 3 Ref.

CODEN: CCREF ISSN: 1078-0432

AVAIL. OF DOC.: UT M.D. Anderson Cancer Center, Houston, TX, U.S.A.

LANGUAGE: English DOCUMENT TYPE: Journal

#### ABSTRACT:

AG-013736 was given in escalating p.o. doses to 30 patients (pts) with solid tumors. The primary objective was to determine the maximum tolerated dose (MTD) and safety. Pharmacokinetics (PK), tumor vascular response by dceMRI, and efficacy were also evaluated. Tumor diagnoses were: breast (11), thyroid (5), renal cell (5), lung (4), and other (5). Toxicity included hypertension (HTN), seizure, hepatopathy, pancreatitis, apnea and stomatitis. 2 Durable partial responses were seen (in renal cell and adenoid cystic carcinomas) and stable disease lasting at least 4 mth (range: 4-13+ mth) was achieved in 5 pts of this heavily pretreated population. AG-013736 is concluded to be a highly active agent as manifested by clinical response and acute tumor vascular changes. (conference abstract: 2003 AACR-NCI-EORTC International Conference, Boston, Massachusetts, USA, 17-21 November, 2003).

SECTION HEADING: T Therapeutics

P Pharmacology S Adverse Effects

CLASSIF. CODE:

8 Pharmacokinetics35 Adverse Reactions

51 Chemotherapy - clinical

64 Clinical Trials73 Trial Preparations

## CONTROLLED TERM:

[01]

AG-013736 \*TR; AG-013736 \*AE; AG-013736 \*DM; DR0068539 \*RN; MAMMA \*TR; MAMMA-DISEASE \*TR; CARCINOMA \*TR; THYROID-DISEASE \*TR; THYROID \*TR; KIDNEY \*TR; NEPHROPATHY \*TR; LUNG \*TR; PNEUMOPATHY \*TR; HYPERTENSION \*AE; EPILEPSY \*AE; HEPATOPATHY \*AE; PANCREATITIS \*AE; APNEA \*AE; STOMATITIS \*AE; HEMOPTYSIS \*AE; PROTEINURIA \*AE; NEOPLASM \*TR; VASCULAR-DISEASE \*AE; ENCEPHALOPATHY \*AE; PANCREOPATHY \*AE; RESPIRATION-DISORDER \*AE; STOMATOLOGY \*AE; HEMORRHAGE \*AE; TYROSINE-KINASE-INHIBITOR \*FT; CYTOSTATIC \*FT; P.O. \*FT; CASES \*FT; IN-VIVO \*FT; CLIN.TRIAL \*FT; DOSAGE \*FT; BLOOD-PLASMA \*FT; CONC. \*FT; ABSORPTION \*FT; CLEARANCE \*FT; HALF-LIFE \*FT; FASTING \*FT; BIOAVAILABILITY \*FT; ANGIOGENESIS-INHIBITOR \*FT; PHASE-I \*FT; TRIAL-PREP. \*FT; CYTOSTATICS \*FT; ANGIOGENESIS-INHIBITORS \*FT; TYROSINE-KINASE-INHIBITORS \*FT; PHARMACOKINETICS \*FT; TR \*FT; AE \*FT; DM \*FT

FIELD AVAIL.: AB; LA; CT FILE SEGMENT: Literature

L15 ANSWER 9 OF 9 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on STN

2006:147499 BIOSIS ACCESSION NUMBER: PREV200600148584 DOCUMENT NUMBER:

A phase I/II study of AG-013736, an oral anti-angiogenesis TITLE:

agent, in combination with docetaxel in patients (pts) with

metastatic breast cancer (MBC).

AUTHOR (S): Rugo, H. S. [Reprint Author]; Stopeck, A.; Badorf, A.;

Pithavala, Y. K.; Steinfeldt, H. M.

Univ Calif San Francisco, San Francisco, CA 94143 USA CORPORATE SOURCE:

Breast Cancer Research and Treatment, (2005) Vol. 94, No. SOURCE:

Suppl. 1, pp. S62.

Meeting Info.: 28th Annual San Antonio Breast Cancer

Symposium. San Antonio, TX, USA. December 08 -11, 2005. San Antonio Canc Inst; Baylor Coll Med; an NCI-Designated Clin Canc Ctr; Canc Therapy & Res Ctr; Univ Texas San Antonio,

Hlth Sci Ctr.

CODEN: BCTRD6. ISSN: 0167-6806.

DOCUMENT TYPE: Conference; (Meeting)

Conference; (Meeting Poster)

LANGUAGE: English

Entered STN: 1 Mar 2006 ENTRY DATE:

Last Updated on STN: 1 Mar 2006

CONCEPT CODE: General biology - Symposia, transactions and proceedings

00520

Biochemistry studies - General

Pathology - Therapy 12512

Urinary system - Pathology 15506

Reproductive system - Physiology and biochemistry

Reproductive system - Pathology

Pharmacology - General 22002

Pharmacology - Clinical pharmacology

Neoplasms - Pathology, clinical aspects and systemic

24004 effects

Neoplasms - Therapeutic agents and therapy

INDEX TERMS: Major Concepts

> Pharmacology; Gynecology (Human Medicine, Medical Sciences); Oncology (Human Medicine, Medical Sciences)

Parts, Structures, & Systems of Organisms INDEX TERMS:

breast: reproductive system

INDEX TERMS: Diseases

renal cell carcinoma: urologic disease, neoplastic

disease

Carcinoma, Renal Cell (MeSH); Kidney Neoplasms (MeSH)

INDEX TERMS: Diseases

metastatic breast cancer: neoplastic disease,

reproductive system disease/female

Breast Neoplasms (MeSH); Neoplasm Metastasis (MeSH)

Chemicals & Biochemicals INDEX TERMS:

> docetaxel: antineoplastic-drug; BID; PDGF receptor tyrosine kinase; AG-013736: oral administration, antiangiogenesis agent, efficacy, phase II clinical trial, phase I clinical trial; VEGF receptor tyrosine

kinase

INDEX TERMS: Methods & Equipment

xenotransplantation: laboratory techniques;

chemotherapy: therapeutic and prophylactic techniques,

clinical techniques

ORGANISM:

Classifier

Hominidae 86215

Super Taxa

Primates; Mammalia; Vertebrata; Chordata; Animalia

Organism Name

human (common): female

Taxa Notes

Animals, Chordates, Humans, Mammals, Primates,

Vertebrates

REGISTRY NUMBER:

114977-28-5 (docetaxel)

101463-26-7 (PDGF receptor tyrosine kinase) 386705-49-3 (VEGF receptor tyrosine kinase)

=> fil reg; d stat que 17

FILE 'REGISTRY' ENTERED AT 12:17:06 ON 10 AUG 2006

USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.

PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

COPYRIGHT (C) 2006 American Chemical Society (ACS)

Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 9 AUG 2006 HIGHEST RN 900096-56-2 DICTIONARY FILE UPDATES: 9 AUG 2006 HIGHEST RN 900096-56-2

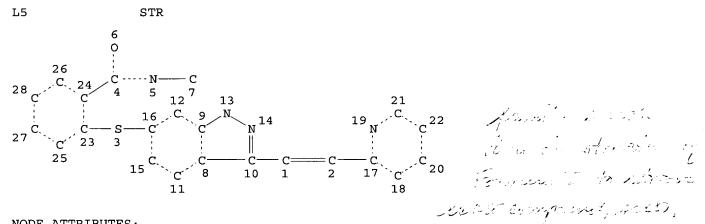
New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH January 6, 2006

Please note that search-term pricing does apply when conducting SmartSELECT searches.

REGISTRY includes numerically searchable data for experimental and predicted properties as well as tags indicating availability of experimental property data in the original document. For information on property searching in REGISTRY, refer to:

http://www.cas.org/ONLINE/UG/regprops.html



NODE ATTRIBUTES: DEFAULT MLEVEL IS ATOM DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES: RING(S) ARE ISOLATED OR EMBEDDED NUMBER OF NODES IS 28

STEREO ATTRIBUTES: NONE

L7 3 SEA FILE=REGISTRY FAM FUL L5

100.0% PROCESSED 21 ITERATIONS SEARCH TIME: 00.00.01 3 ANSWERS

Special Commencer of State Williams

Wall but the for whom he

ARK The or Borner, medicing and

=> d ide 17 1-3

```
ANSWER 1 OF 3 REGISTRY COPYRIGHT 2006 ACS on STN
Ь7
     885126-40-9 REGISTRY
RN
     Entered STN: 22 May 2006
ED
    Benzamide, N-methyl-2-[[3-[(1Z)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-
CN
    yl]thio]- (9CI)
                     (CA INDEX NAME)
FS
    STEREOSEARCH
    C22 H18 N4 O S
MF
SR
    CA
                 CA, CAPLUS, CASREACT, USPATFULL
    STN Files:
LC
```

Double bond geometry as shown.

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

2 REFERENCES IN FILE CA (1907 TO DATE)
2 REFERENCES IN FILE CAPLUS (1907 TO DATE)

```
ANSWER 2 OF 3 REGISTRY COPYRIGHT 2006 ACS on STN
L7
     771570-72-0 REGISTRY
RN
     Entered STN: 29 Oct 2004
ED
     Benzenepropanoic acid, β-[[(1,1-dimethylethoxy)carbonyl]amino]-
CN
     \alpha-hydroxy-, (2aR,4S,4aS,6R,9S,11S,12S,12aR,12bS)-12b-(acetyloxy)-12-
     (benzoyloxy) -2a,3,4,4a,5,6,9,10,11,12,12a,12b-dodecahydro-4,6,11-
     trihydroxy-4a,8,13,13-tetramethyl-5-oxo-7,11-methano-1H-
     cyclodeca[3,4]benz[1,2-b]oxet-9-yl ester, (\alpha R, \beta S)-, mixt. with
     N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-
     yl]thio]benzamide (9CI) (CA INDEX NAME)
FS
     STEREOSEARCH
MF
     C43 H53 N O14 . C22 H18 N4 O S
CI
     MXS
SR
     CA
                  CA, CAPLUS, TOXCENTER, USPATFULL
LC
     STN Files:
     CM
          1
     CRN 319460-85-0
     CMF C22 H18 N4 O S
```

Double bond geometry as shown.

CM 2

CRN 114977-28-5 CMF C43 H53 N O14

Absolute stereochemistry.

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L7 ANSWER 3 OF 3 REGISTRY COPYRIGHT 2006 ACS on STN

RN 319460-85-0 REGISTRY

ED Entered STN: 02 Feb 2001

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN AG 013736

CN Axitinib

FS STEREOSEARCH

DR 790713-39-2

MF C22 H18 N4 O S

CI COM

SR CA

LC STN Files: ADISINSIGHT, CA, CAPLUS, CASREACT, IMSDRUGNEWS, IPA, PHAR, PROUSDDR, SYNTHLINE, TOXCENTER, USAN, USPAT2, USPATFULL

Double bond geometry as shown.

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 17 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA
- 17 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> => fil capl; s 17

FILE 'CAPLUS' ENTERED AT 12:21:01 ON 10 AUG 2006

USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.

PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

COPYRIGHT (C) 2006 AMERICAN CHEMICAL SOCIETY (ACS)

Copyright of the articles to which records in this database refer is held by the publishers listed in the PUBLISHER (PB) field (available for records published or updated in Chemical Abstracts after December 26, 1996), unless otherwise indicated in the original publications. The CA Lexicon is the copyrighted intellectual property of the American Chemical Society and is provided to assist you in searching databases on STN. Any dissemination, distribution, copying, or storing of this information, without the prior written consent of CAS, is strictly prohibited.

FILE COVERS 1907 - 10 Aug 2006 VOL 145 ISS 7 FILE LAST UPDATED: 9 Aug 2006 (20060809/ED)

Effective October 17, 2005, revised CAS Information Use Policies apply. They are available for your review at:

http://www.cas.org/infopolicy.html
'OBI' IS DEFAULT SEARCH FIELD FOR 'CAPLUS' FILE

L18 17 L7

=> s 118 not 11
L19 16 L18 NOT (L1) previously printed of inventor securch

=> fil ipa toxcenter prousddr phar adisin; s 17 FILE 'IPA' ENTERED AT 12:21:34 ON 10 AUG 2006 Copyright (c) 2006 The Thomson Corporation

FILE 'TOXCENTER' ENTERED AT 12:21:34 ON 10 AUG 2006 COPYRIGHT (C) 2006 ACS

FILE 'PROUSDDR' ENTERED AT 12:21:34 ON 10 AUG 2006 COPYRIGHT (C) 2006 Prous Science

FILE 'PHAR' ENTERED AT 12:21:34 ON 10 AUG 2006 COPYRIGHT (C) 2006 Informa UK Ltd.

FILE 'ADISINSIGHT' ENTERED AT 12:21:34 ON 10 AUG 2006 COPYRIGHT (C) 2006 Adis Data Information BV

L20 19 L7

=> => fil wpix; d que 122 FILE 'WPIX' ENTERED AT 12:24:12 ON 10 AUG 2006 COPYRIGHT (C) 2006 THE THOMSON CORPORATION

FILE LAST UPDATED: 9 AUG 2006 <20060809/UP>
MOST RECENT DERWENT UPDATE: 200651 <200651/DW>
DERWENT WORLD PATENTS INDEX SUBSCRIBER FILE, COVERS 1963 TO DATE

>>> FOR A COPY OF THE DERWENT WORLD PATENTS INDEX STN USER GUIDE,
PLEASE VISIT:

http://www.stn-international.de/training\_center/patents/stn\_guide.pdf <

>>> FOR DETAILS OF THE PATENTS COVERED IN CURRENT UPDATES, SEE http://scientific.thomson.com/support/patents/coverage/latestupdates/

>>> PLEASE BE AWARE OF THE NEW IPC REFORM IN 2006, SEE http://www.stn-international.de/stndatabases/details/ipc\_reform.html and http://scientific.thomson.com/media/scpdf/ipcrdwpi.pdf <<<

L22 11 SEA FILE=WPIX ABB=ON RA3G48/DCN OR 366778-0-0-0/DCRE OR AXITINIB/BI,ABEX OR AG013736/BI,ABEX OR AG 013736/BI,ABEX

=> dup rem 119,120,122

DUPLICATE IS NOT AVAILABLE IN 'PROUSDDR, PHAR, ADISINSIGHT'.

ANSWERS FROM THESE FILES WILL BE CONSIDERED UNIQUE

FILE 'CAPLUS' ENTERED AT 12:24:22 ON 10 AUG 2006

USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.

PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

COPYRIGHT (C) 2006 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'IPA' ENTERED AT 12:24:22 ON 10 AUG 2006 Copyright (c) 2006 The Thomson Corporation

FILE 'TOXCENTER' ENTERED AT 12:24:22 ON 10 AUG 2006 COPYRIGHT (C) 2006 ACS

FILE 'PROUSDDR' ENTERED AT 12:24:22 ON 10 AUG 2006 COPYRIGHT (C) 2006 Prous Science

FILE 'PHAR' ENTERED AT 12:24:22 ON 10 AUG 2006

Gembeh 10/816242 Page 17

COPYRIGHT (C) 2006 Informa UK Ltd.

FILE 'ADISINSIGHT' ENTERED AT 12:24:22 ON 10 AUG 2006 COPYRIGHT (C) 2006 Adis Data Information BV

FILE 'WPIX' ENTERED AT 12:24:22 ON 10 AUG 2006

COPYRIGHT (C) 2006 THE THOMSON CORPORATION

PROCESSING COMPLETED FOR L19 PROCESSING COMPLETED FOR L20 PROCESSING COMPLETED FOR L22

22 DUP REM L19 L20 L22 (24 DUPLICATES REMOVED) L23

ANSWERS '1-16' FROM FILE CAPLUS ANSWER '17' FROM FILE TOXCENTER ANSWER '18' FROM FILE PROUSDDR ANSWER '19' FROM FILE PHAR

ANSWER '20' FROM FILE ADISINSIGHT ANSWERS '21-22' FROM FILE WPIX

=> d ibib ed abs hitstr 1-16; d iall 17-18; d all 19; d iall 20; d iall abeq tech 21-22; fil hom

L23 ANSWER 1 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 1

ACCESSION NUMBER:

2006:436998 CAPLUS

DOCUMENT NUMBER:

144:468156

TITLE:

Process for preparation of indazoles

INVENTOR(S):

Babu, Srinivasan; Dagnino, Raymond, Jr.; Ouellette, Michael Allen; Shi, Bing; Tian, Qingping; Zook, Scott

Edward

PATENT ASSIGNEE(S):

Pfizer Inc., USA

SOURCE:

ED GΙ PCT Int. Appl., 44 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT: 1

PATENT NO.	KIND DATE	APPLICATION NO.	DATE			
WO 2006048745	A1 20060	0511 WO 2005-IB3300	20051021			
W: AE, AG, AL,	AM, AT, AU,	AZ, BA, BB, BG, BR, BW,	BY, BZ, CA, CH,			
CN, CO, CR,	CU, CZ, DE,	DK, DM, DZ, EC, EE, EG,	ES, FI, GB, GD,			
GE, GH, GM,	HR, HU, ID,	IL, IN, IS, JP, KE, KG,	KM, KP, KR, KZ,			
		LV, LY, MA, MD, MG, MK,				
• • • • • • • • • • • • • • • • • • • •		PG, PH, PL, PT, RO, RU,				
SK, SL, SM,	SY, TJ, TM,	TN, TR, TT, TZ, UA, UG,	US, UZ, VC, VN,			
YU, ZA, ZM,						
• • •		DE, DK, EE, ES, FI, FR,	GB, GR, HU, IE,			
		NL, PL, PT, RO, SE, SI,				
• • •		GQ, GW, ML, MR, NE, SN,				
		SD, SL, SZ, TZ, UG, ZM,				
	RU, TJ, TM		, , , ,			
PRIORITY APPLN. INFO.:	,	US 2004-624575P	P 20041102			
OTHER SOURCE(S): ED Entered STN: 11 Ma		168156				

This invention relates to methods for preparing indazole derivs. I [wherein AΒ R1 = (un)substituted -CH=CH-R5 or -CH=N-R5; R2 = (un)substituted (cyclo)alkyl, (cyclo)alkoxy, aryloxy, (hetero)aryl, etc.; R3 and R4 = independently H, halo, or (un) substituted alkyl; R5 = (un) substituted (cyclo)alkyl, heterocycloalkyl, or (hetero)aryl], or pharmaceutically acceptable salts or solvates thereof. For example, intermediates 6-iodo-3-((E)-2-pyridin-2-yl-vinyl)-1-(tetrahydropyran-2-yl)-1H-indazole and 2-mercapto-N-methylbenzamide were prepared in multi-step syntheses comprising Heck vinylation, reduction, diazotization, and iodination reactions. The intermediates obtained in previous step were reacted in DMF at 80  $^{\circ}\text{C}$  for 4-16 h in the presence of palladium catalyst and cesium carbonate, followed by deprotecting the tetrahydropyanyl group in methanol in the presence of p-toluenesulfonic acid to give II in moderate yield. The title compds. are useful as modulators and/or inhibitors of protein kinases for the treatment of cancer or other diseases (no data). IT 319460-85-0P

RL: IMF (Industrial manufacture); PRP (Properties); SPN (Synthetic preparation); PREP (Preparation)

(preparation of indazoles)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

# IT 885126-40-9P

RL: IMF (Industrial manufacture); SPN (Synthetic preparation); PREP (Preparation)

(preparation of indazoles)

RN 885126-40-9 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1Z)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT:

THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 2 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 2

ACCESSION NUMBER:

2006:268466 CAPLUS

DOCUMENT NUMBER:

144:324798

TITLE:

Simultaneous use of sulfonamide-containing compound

and angiogenesis inhibitor

INVENTOR(S):

Owa, Takashi; Ozawa, Yoichi; Semba, Taro

PATENT ASSIGNEE(S):

Eisai Co., Ltd., Japan PCT Int. Appl., 270 pp.

SOURCE:

CODEN: PIXXD2

Patent

DOCUMENT TYPE: LANGUAGE:

Japanese

FAMILY ACC. NUM. COUNT:

PATENT NO.							DATE		APPLICATION NO.						DATE			
WO	2006	0309	41		A1	-	2006	0323	1	WO 2	005-i	JP17:	228		2	0050	913	
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BW,	BY,	BZ,	CA,	CH,	
		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,	
		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KΕ,	KG,	KM,	ΚP,	KR,	ΚŻ,	
		LC,	LK,	LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NA,	
		NG,	NI,	NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	
		SL,	SM,	SY,	ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UΖ,	VC,	VN,	YU,	
		ZA,	ZM,	zw														
	RW:	AT,	ΒÉ,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	FI,	FR,	GΒ,	GR,	HU,	ΙE,	
		IS,	IT,	LT,	LU,	LV,	MC,	NL,	PL,	PT,	RO,	SE,	SI,	SK,	TR,	BF,	ВJ,	
		CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG,	BW,	GH,	
		GM,	KΕ,	LS,	MW,	MZ,	ΝA,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	ΑZ,	BY,	
		KG,	ΚZ,	•	RU,	•												
WO	2006	0309	_		A1										_	0050		
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BB,	ВG,	BR,	BW,	BY,	ΒZ,	CA,	CH,	
			•		CU,		-	•		-								
					HR,													
		•		•	LS,		-		•					-	-			
					NZ,													
		SL,	SM,	SY,	TJ,	TM,	TN,	TR,	TT,	TZ,	UA,	ŪĠ,	US,	UZ,	VC,	VN,	YU,	
			ΖM,															
	RW:	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	FI,	FR,	GB,	GR,	HU,	ΙE,	

IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,

KG, KZ, MD, RU, TJ, TM

US 2006135486 A1 20060622 US 2005-226655 20050913 PRIORITY APPLN. INFO.: US 2004-609452P Ρ 20040913 JP 2005-54150 20050228 Α JP 2005-54475 20050228

OTHER SOURCE(S): MARPAT 144:324798

Entered STN: 23 Mar 2006

A pharmaceutical composition comprising a sulfonamide-containing compound AB combined

with an angiogenesis inhibitor.

319460-85-0, AG 013736 IT

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL

(Biological study); USES (Uses)

(sulfonamide-containing compds. and angiogenesis inhibitors for combination chemotherapy of cancer)

RN319460-85-0 CAPLUS

Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-CNyl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

THERE ARE 15 CITED REFERENCES AVAILABLE FOR THIS REFERENCE COUNT: 15 RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 3 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 3

ACCESSION NUMBER:

2006:167588 CAPLUS

DOCUMENT NUMBER:

144:254148

TITLE:

Aminopteridinones as anticancer agents, their

preparation, pharmaceutical compositions, and use in

therapy

INVENTOR(S):

Munzert, Gerd; Steegmaier, Martin; Baum, Anke

PATENT ASSIGNEE(S):

Boehringer Ingelheim International G.m.b.H., Germany;

Boehringer Ingelheim Pharma G.m.b.H. & Co. K.-G.

PCT Int. Appl., 158 pp. SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2006018182	<b>A1</b>	20060223	WO 2005-EP8623	20050809
WO 2006018182	C1	20060608		

```
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH,
            CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD,
            GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KP, KR, KZ,
            LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA,
            NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK,
            SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU,
            ZA, ZM, ZW
        RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE,
            IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ,
            CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH,
            GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,
            KG, KZ, MD, RU, TJ, TM
    US 2006058311
                               20060316
                                            US 2005-189540
                                                                   20050726
                         Α1
PRIORITY APPLN. INFO.:
                                            EP 2004-19361
                                                              A 20040814
                                            EP 2004-19448
                                                              A 20040817
OTHER SOURCE(S):
                        MARPAT 144:254148
```

Entered STN: 23 Feb 2006

GT

\* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT \*

The invention relates to a group of aminopteridinones I, which are useful for the treatment of diseases which involve cell proliferation. In compds. I, R1 and R2 are independently selected from H and (un) substituted C1-6 alkyl, or R1 and R2 together form a 2- to 5-membered alkylene bridge, optionally containing 1 or 2 heteroatoms; R3 is (un)substituted C1-12 alkyl, C2-12 alkenyl, C2-12 alkynyl, C6-14 aryl, etc.; R4 is H, OH, CN, halo, (un) substituted amino, (un) substituted C1-6 alkyl, C1-5 alkoxy, etc.; L is (un) substituted C2-10 alkylene, (un) substituted C2-10 alkenylene, (un) substituted C6-14 arylene, etc.; R5 is (un) substituted morpholinyl, (un) substituted piperidinyl, (un) substituted piperazinyl, (un) substituted piperazinylcarbonyl, (un)substituted pyrrolidinyl, (un)substituted thiomorpholinyl, etc.; n is 0 or 1; and m is 1 or 2; including tautomers, stereoisomers, salts, solvates, polymorphs, and prodrugs thereof. The invention also relates to the preparation of I, pharmaceutical compns. comprising a compound I, at least one other therapeutic agent, optionally with one or more pharmaceutically acceptable excipients, as well as to the use of the compns. for the treatment of diseases which involve cell proliferation, migration or apoptosis of cancer cells, or angiogenesis. Esterification of (R)-2-aminobutyric acid and reductive condensation with cyclopentanone gave cyclopentylamine II, which underwent regioselective substitution of 2,4-dichloro-5-nitropyrimidine and reductive heterocyclization to form pteridinone III. N-Methylation of III followed by substitution with 4-amino-3-methoxybenzoic acid and amidation with 1-methyl-4-aminopiperidine resulted in the formation of aminopteridinone IV. A combination of suboptimal doses of irinotecan and compound IV shows an additive/synergistic effect in a human colon carcinoma model and is well tolerated. Meanwhile, compound IV acts at least additively with docetaxel in a human non-small cell lung carcinoma model and not antagonistically with gemcitabine in a human adenocarcinoma model.

IT 319460-85-0, AG 013736

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(preparation of aminopteridinones for use in combination therapy for treatment of cell proliferative diseases)

RN319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

MeNH O H N N E N N N

REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 4 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 4

ACCESSION NUMBER: 2006:409892 CAPLUS

DOCUMENT NUMBER: 144:432800

TITLE: Preparation of indazole compounds as modulators and/or

inhibitors of protein kinases

INVENTOR(S): Ewanicki, Brigitte Leigh; Flahive, Erik Jon;

Kasparian, Annie Judith; Mitchell, Mark Bryan; Perry, Michael David; O'neill-Slawecki, Stacy Ann; Sach, Neal William; Saenz, James Edward; Shi, Bing; Stankovic, Nebojsa Slobodan; Srirangam, Jayaram Kasturi; Tian,

Qingping; Yu, Shu

PATENT ASSIGNEE(S): Agouron Pharmaceuticals, Inc., USA

SOURCE: U.S. Pat. Appl. Publ., 31 pp.

CODEN: USXXCO

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

ED GI

PA	TENT	NO.			KIN		DATE		i	APPL	ICAT	ION I	NO.		Di	ATE	
US	2006	0948	81				2006	0504	1	US 2	005-	2644	40		20	0051	031
WO	2006	0487	44		A1		2006	0511	1	WO 2	005-	IB32	97		20	0051	021
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	AZ,	BA,	BB,	ВG,	BR,	BW,	BY,	ΒZ,	CA,	CH,
		CN,	co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,
		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KM,	KΡ,	KR,	ΚZ,
		LC,	LK,	LR,	LS,	LT,	LU,	LV,	LY,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,
		NA,	NG,	NI,	NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,
		SK,	SL,	SM,	SY,	TJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	VN,
		YU,	ZA,	ZM,	ZW												
	RW:	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	FI,	FR,	GB,	GR,	HU,	ΙE,
		IS,	IT,	LT,	LU,	LV,	MC,	NL,	PL,	PT,	RO,	SE,	SI,	SK,	TR,	BF,	ВJ,
		CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG,	BW,	GH,
		GM,	KE,	LS,	MW,	MZ,	NA,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	AZ,	BY,
		KG,	KZ,	MD,	RU,	TJ,	TM										
PRIORIT	Y APP	LN.	INFO	. :	, 110, 10, 111				1	US 2	004-	6246	35P	]	P 20	0041	102
									1	US 2	005-	7170	71P	]	P 20	0050	914
OTHER S	THER SOURCE(S):						T 14	4:43	2800	; MA	RPAT	144	:432	800			
ED En	tered	STN	: 0	5 Ma	y 20	06											

AB The present invention relates to methods for preparing indazole compds. which are useful as modulators and/or inhibitors of protein kinases. The present invention also relates to intermediate compds. useful in the preparation of the compds. E.g., I was prepared by reaction of 2-(3-iodo-1H-indazol-6-ylsulfanyl)-N-methylbenzamide and 2-vinylpyridine.

IT 885126-40-9P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation of indazole compds. as modulators and/or inhibitors of protein kinases)

RN 885126-40-9 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1Z)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

I

Double bond geometry as shown.

IT 319460-85-0P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of indazole compds. as modulators and/or inhibitors of protein kinases)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

L23 ANSWER 5 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 5

ACCESSION NUMBER:

2006:409884 CAPLUS

DOCUMENT NUMBER:

144:439992

TITLE:

Polymorphic forms of 6-[2-(methylcarbomoyl) phenyl sulfanyl]-3-E-[2-(pyridin-2-yl)ethenyl]indazole and pharmaceutical uses for hyperproliferative disorders

INVENTOR (S):

Ye, Qiang; Hart, Ryan Marshal; Kania, Robert; Ouellette, Michael; Wu, Zhen Ping; Zook, Scott Edward

Agouron Pharmaceuticals, Inc., USA

PATENT ASSIGNEE(S): SOURCE:

U.S. Pat. Appl. Publ., 35 pp.

CODEN: USXXCO

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATE	ENT I	NO.			KIN	D :	DATE		APPLICATION NO.					DATE				
						_												
US 2	2006	0947	53		A1		2006	0504	1	US 2	005-3	2644	93		20	0051	031	
WO 2	2006	0487	51		A1		2006	0511	1	WO 2	005-	IB33	12		20	0051	021	
	W:	ΑE,	AG,	AL,	AM,	ΑT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BW,	BY,	ΒZ,	CA,	CH,	
		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,	
		GE,	GH,	GM,	HR,	HU,	IQ,	ΙL,	IN,	IS,	JP,	KΕ,	KG,	KM,	KΡ,	KR,	ΚZ,	
		LC,	LK,	LR,	LS,	LT,	LU,	LV,	LY,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	
		NA,	NG,	NI,	NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	
		SK,	SL,	SM,	SY,	ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	VN,	
		YU,	ZA,	ZM,	ZW													
	RW:	AT,	BE,	ВG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	FI,	FR,	GB,	GR,	HU,	ΙE,	
		IS,	IT,	LT,	LU,	LV,	MC,	NL,	PL,	PT,	RO,	SE,	SI,	SK,	TR,	BF,	ВJ,	
		CF,	CG,	CI,	CM,	GΑ,	GN,	GQ,	GW,	ML,	MR,	ΝE,	SN,	TD,	TG,	BW,	GH,	
		GM,	KE,	LS,	MW,	MZ,	NA,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	ΑZ,	BY,	
		KG,	KZ,	MD,	RU,	TJ,	TM											
RITY APPLN. INFO.:									1	US 2	004-	6246	65P	:	P 2	0041	102	
Ente	hare	CTM	. 0	5 Mar	7 20	06												

PRIOR

ED Entered STN: 05 May 2006

The present invention relates to novel polymorphic forms of AB 6-[2-(methylcarbamoyl)phenylsulfanyl]-3-E-[2-(pyridin-2yl)ethenyl]indazole, and to processes for their preparation Such polymorphic forms may be a component of a pharmaceutical composition and may be used to treat a hyperproliferative disorder or a mammalian disease condition mediated by protein kinase activity.

IT 319460-85-0

> RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses) (polymorphic forms of 6-[2-(methylcarbomoyl) Ph sulfanyl]-3-E-[2-(pyridin-2-yl)ethenyl]indazole and pharmaceutical uses for hyperproliferative disorders)

RN 319460-85-0 CAPLUS

Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-CN yl]thio] - (9CI) (CA INDEX NAME)

Double bond geometry as shown.

CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 6 L23 ANSWER 6 OF 22

ACCESSION NUMBER: 2006:189296 CAPLUS

DOCUMENT NUMBER: 144:324360

TITLE: Antiangiogenic Therapy Decreases Integrin Expression

in Normalized Tumor Blood Vessels

Yao, Virginia J.; Ozawa, Michael G.; Varner, Amanda AUTHOR(S):

S.; Kasman, Ian M.; Chanthery, Yvan H.; Pasqualini, Renata; Arap, Wadih; McDonald, Donald M.

CORPORATE SOURCE: Department of Anatomy, Cardiovascular Research

Institute, Comprehensive Cancer Center, University of

California, San Francisco, CA, USA

Cancer Research (2006), 66(5), 2639-2649 SOURCE:

CODEN: CNREA8; ISSN: 0008-5472

PUBLISHER: American Association for Cancer Research

DOCUMENT TYPE: Journal LANGUAGE: English ED Entered STN: 02 Mar 2006

Tumor blood vessels normalized by antiangiogenic therapy may provide AB improved delivery of chemotherapeutic agents during a window of time but it is unknown how protein expression in tumor vascular endothelial cells changes. We evaluated the distribution of RGD-4C phage, which binds  $\alpha v\{szligbeta\}3$ ,  $\alpha v\{szligbeta\}5$ , and  $\alpha 5\{szligbeta\}1$ integrins on tumor blood vessels before and after antiangiogenic therapy. Unlike the control phage, fd-tet, RGD-4C phage homed to vascular endothelial cells in spontaneous tumors in RIP-Tag2 transgenic mice in a dose-dependent fashion. The distribution of phage was similar to  $\alpha v\{szligbeta\}$ 3 and  $\alpha 5\{szligbeta\}$ 1 integrin expression. Blood

vessels that survived treatment with AG-013736, a small mol. inhibitor of vascular endothelial growth factor and platelet-derived growth factor receptors, had only 4% as much binding of RGD-4C phage compared with vessels in untreated tumors. Cellular distribution of RGD-4C phage in surviving tumor vessels matched the  $\alpha 5\{\text{szligbeta}\}1$  integrin expression. The reduction in integrin expression on tumor vessels after antiangiogenic therapy raises the possibility that integrin-targeted delivery of diagnostics or therapeutics may be compromised. Efficacious delivery of drugs may benefit from identification by in vivo phage display of targeting peptides that bind to tumor blood vessels normalized by

antiangiogenic agents. IT 319460-85-0, AG 013736

RL: DMA (Drug mechanism of action); PAC (Pharmacological activity); THU

(Therapeutic use); BIOL (Biological study); USES (Uses)

(antiangiogenic therapy effect on integrin in tumor blood vessels)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT: 49 THERE ARE 49 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 7 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 7

ACCESSION NUMBER: 2006:394720 CAPLUS

DOCUMENT NUMBER: 145:39944

TITLE: Inhibition of phosphorylation of the

colony-stimulating factor-1 receptor (c-Fms) tyrosine

kinase in transfected cells by ABT-869 and other

tyrosine kinase inhibitors

AUTHOR(S): Guo, Jun; Marcotte, Patrick A.; McCall, J. Owen; Dai,

Yujia; Pease, Lori J.; Michaelides, Michael R.;

Davidsen, Steven K.; Glaser, Keith B.

CORPORATE SOURCE: Cancer Discovery Research (R47J), Global

Pharmaceutical Research and Development, Abbott

Laboratories, Abbott Park, IL, USA

SOURCE: Molecular Cancer Therapeutics (2006), 5(4), 1007-1013

CODEN: MCTOCF; ISSN: 1535-7163

PUBLISHER: American Association for Cancer Research

DOCUMENT TYPE: Journal LANGUAGE: English ED Entered STN: 01 May 2006

The properties of several multitargeted receptor tyrosine kinase AB inhibitors were studied for their inhibition of colony-stimulating factor-1 receptor (CSF-1R) signaling. A structurally novel, multitargeted tyrosine kinase inhibitor (ABT-869), imatinib (STI571), and 4 compds. currently in clin. development (AG013736, BAY 43-9006, CHIR258, and SU11248) were tested for inhibition of CSF-1R signaling in both the enzymic and cellular assays. ABT-869 showed potent CSF-1R inhibition in both the enzyme and cell-based assays (IC50s < 20 nmol/L). In contrast to a previous report, we have found that imatinib has activity against human CSF-1R in both assays at submicromolar concns. In enzyme assays, we have found that the inhibition of CSF-1R by both ABT-869 and imatinib are competitive with ATP, with Ki values of 3 and 120 nmol/L, resp. SU11248 is a potent inhibitor of CSF-1R in the enzyme assay (IC50 = 7 nmol/L) and inhibits receptor phosphorylation in the cellular assay (IC50 = 61 nmol/L). AG013736 was also a potent inhibitor of CSF-1R in both assays (enzyme, IC50 = 16 nmol/L; cellular, IC50 = 21 nmol/L), whereas BAY 43-9006 is less potent in the enzyme assay (IC50 = 107 nmol/L) than in the

cellular system (IC50 = 20 nmol/L). In contrast, we found that CHIR258 had less activity in the cellular assay (IC50 = 535 nmol/L) relative to its enzymic potency (IC50 = 26 nmol/L). These results show the use of a cell-based assay to confirm the inhibitory activity of lead compds. and drug candidates, such as ABT-869, against the CSF-1R protein in situ.

TT 319460-85-0, AG 013736 RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL

(Biological study); USES (Uses)

(AG 013736; inhibition of phosphorylation of c-Fms receptor tyrosine kinase in cells by ABT-869)

319460-85-0 CAPLUS RN

Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-CN yl]thio] - (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT: 27 THERE ARE 27 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 8 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 8

ACCESSION NUMBER:

2005:1294044 CAPLUS

DOCUMENT NUMBER:

144:17160

TITLE:

Method using camptothecin compounds, pyrimidine

derivatives, and antitumor agents for treating

abnormal cell growth

INVENTOR(S):

Denis, Louis J.; Compton, Linda D.

PATENT ASSIGNEE(S):

Pfizer Inc, USA

SOURCE:

U.S. Pat. Appl. Publ., 32 pp.

CODEN: USXXCO

DOCUMENT TYPE:

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT	NO.			KIN	) -	DATE		j	APPL:	ICAT:		DATE				
US 2005	2727	55		A1		2005	1208	1	US 2	005-	1450	97		2	0050	503
WO 2005	1179	80		<b>A1</b>		2005	1215	1	WO 2	005-3	IB15:	27		20050523		
W :	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BW,	BY,	ΒZ,	CA,	CH,
	CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,
	GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KM,	KP,	KR,	KZ,
	LC,	LK,	LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NA,
	NG,	NI,	NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,
	SL,	SM,	SY,	ТJ,	TM,	TN,	TR,	TT,	TZ,	UΑ,	UG,	US,	UΖ,	VC,	VN,	YU,
	ZA,	ZM,	zw													
RW:	BW,	GH,	GM,	ΚE,	LS,	MW,	MZ,	NA,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,
	ΑZ,	BY,	KG,	KZ,	MD,	RU,	ТJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,

EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.:

US 2004-577268P P 20040604

ED Entered STN: 09 Dec 2005

The invention discloses a method for treating abnormal cell growth in a subject, comprising administering to the subject (a) a compound selected from a camptothecin, a camptothecin derivative, or a pharmaceutically acceptable salt, solvate or prodrug thereof; (b) a pyrimidine derivative or a pharmaceutically acceptable salt, solvate or prodrug thereof; and (c) an antitumor agent selected from antiproliferative agents, kinase inhibitors, angiogenesis inhibitors, growth factor inhibitors, COX-1 inhibitors, COX-2 inhibitors, mitotic inhibitors, alkylating agents, antimetabolites, intercalating antibiotics, growth factor inhibitors, radiation, cell cycle inhibitors, enzymes, topoisomerase inhibitors, biol. response modifiers, antibodies, cytotoxics, antihormones, antiandrogens and combinations thereof.

IT 319460-85-0, AG 013736

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(AG 013736; camptothecin compds., pyrimidine derivs., and antitumor agents for treatment of abnormal cell growth)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

L23 ANSWER 9 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 9

ACCESSION NUMBER:

2005:140815 CAPLUS

DOCUMENT NUMBER:

142:212410

TITLE:

Indazole compounds and pharmaceutical compositions for inhibiting protein kinases, and their therapeutic use

INVENTOR(S):

Bender, Steven; Skalitzky, Donald J.; Hu-Lowe, Dana

PATENT ASSIGNEE(S):

USA

SOURCE:

U.S. Pat. Appl. Publ., 21 pp., Cont.-in-part of U.S.

Ser. No. 326,037.

CODEN: USXXCO

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

: 2

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
				<del>-</del> -
119 2005038097	λ1	20050217	US 2003-639890	20030812

EP	1614	683			<b>A1</b>	:	2006	0111	EP	20	05-3	15902	2			20000	630
	R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB, G	R,	IT,	LI,	LU,	NL,	SE	, MC,	PT,
		ΙE,	SI,	LT,	LV,	FI,	RO,	MK,	CY, A	L							
US	6531	491			B1	- 2	2003	0311	US	20	01-9	98378	36			20011	025
US	6534	524			B1	:	2003	0318	US	20	01-9	98378	33			20011	025
US	2004	1716	34		A1	:	2004	0902	US	20	003-2	3267	55			20030	213
US	6884	890			B2	:	2005	0426									
US	2004	2202	48		A1	:	2004	1104	US	20	003-3	3260	37			20030	215
US	6891	044			B2	:	2005	0510									
US	2005	1246	62		A1	:	2005	0609	US	20	004-9	99214	46			20041	118
PRIORITY	APP	LN.	INFO	. :					US	19	999-	1421	30P		P	19990	702
									US	20	000-	5093	35		B3	20000	630
									US	20	001-	98378	33		<b>A</b> 3	20011	025
									US	20	003-3	3260	37		A2	20030	215
									EP	20	000-9	9433′	75		Α3	20000	630
									US	20	01-	98378	86		А3	20011	025

OTHER SOURCE(S): MARPAT 142:212410

ED Entered STN: 18 Feb 2005

AB Indazole compds. that modulate and/or inhibit the activity of certain protein kinases are described. These compds. and pharmaceutical compns. containing them are capable of mediating tyrosine kinase signal transduction and thereby modulate and/or inhibit unwanted cell proliferation. The invention is also directed to the therapeutic or prophylactic use of pharmaceutical compns. containing such compds., and to methods of treating cancer and other disease states associated with unwanted angiogenesis and/or cellular proliferation, such as diabetic retinopathy, neovascular glaucoma, rheumatoid arthritis, and psoriasis, by administering effective amts. of such compds.

IT 319460-85-0

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(indazole compds. and pharmaceutical compns. for inhibiting protein kinases, and therapeutic use)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

L23 ANSWER 10 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 10

144:80723

ACCESSION NUMBER: 2

2005:1038009 CAPLUS

DOCUMENT NUMBER: TITLE:

Phase I trial of the oral antiangiogenesis agent

AG-013736 in patients with advanced solid tumors:

pharmacokinetic and clinical results

AUTHOR(S):

Rugo, Hope S.; Herbst, Roy S.; Liu, Glenn; Park, John

W.; Kies, Merrill S.; Steinfeldt, Heidi M.; Pithavala, Yazdi K.; Reich, Steven D.; Freddo, James L.; Wilding, George

CORPORATE SOURCE:

San Francisco Comprehensive Cancer Center, University of California, San Francisco, USA Journal of Clinical Oncology (2005), 23(24), 5474-5483

SOURCE:

CODEN: JCONDN; ISSN: 0732-183X
American Society of Clinical Oncology

PUBLISHER:
DOCUMENT TYPE:
LANGUAGE:

Journal English

ED Entered STN: 28 Sep 2005

Purpose: We studied the safety, clin. activity, and pharmacokinetics (PK) AB of AG-013736, an oral receptor tyrosine kinase inhibitor of vascular endothelial cell growth factor, platelet-derived growth factor, and c-Kit, in patients with advanced cancer. Patients and Methods: Patients received fixed doses of AG-013736 orally in 28-day cycles. In the first cohort, patients initially received two single test doses of AG-013736 (10 and 30 mg); subsequent dosing was determined by individual PK parameters. Doses in subsequent cohorts were assigned by using a traditional dose-escalation/de-escalation rule based on observed toxicities in the current and previous cohorts. PK anal. included evaluation of the effect of food and antacid. Results: Thirty-six patients received AG-013736 at doses ranging from 5 to 30 mg by mouth twice daily. The dose-limiting toxicities observed included hypertension, hemoptysis, and stomatitis and were seen primarily at the higher dose levels. The observed hypertension was manageable with medication. Stomatitis was generally tolerable and managed by dose reduction or drug holidays. AG-013736 was absorbed rapidly, with peak plasma concns. observed within 2 to 6 h after dosing. The maximum-tolerated dose and recommended phase II dose of AG-013736 is 5 mg, twice daily, administered in the fasted state. No significant drug interaction with antacid was seen. There were three confirmed partial responses and other evidence of clin. activity. Conclusion: In this study, we have demonstrated clin. activity and safety of AG-013736 in patients with advanced solid tumors and identified the dose for phase II testing. The unique phase I study design allowed early identification of important absorption and metabolic issues critical to phase II testing of this agent.

IT **319460-85-0**, AG 013736

RL: ADV (Adverse effect, including toxicity); PAC (Pharmacological activity); PKT (Pharmacokinetics); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(phase I trial showed MTD, RD of oral antiangiogenic agent AG-013736 was 5mg BID and was effective, safe with high Cmax, AUC and low Tmax, T1/2 despite of manageable DLTs in patient with advanced solid tumors)

RN 319460-85-0 CAPLUS CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-

CN Benzamide, N-methy1-2-[[3-[(1E)-2-(2-pyridiny1)etheny1]-1H-indazo1-6yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT:

THERE ARE 46 CITED REFERENCES AVAILABLE FOR THIS 46 RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 11 L23 ANSWER 11 OF 22

ACCESSION NUMBER:

2005:1038008 CAPLUS

DOCUMENT NUMBER:

144:80496

TITLE:

Dynamic contrast-enhanced magnetic resonance imaging. as a pharmacodynamic measure of response after acute dosing of AG-013736, an oral angiogenesis inhibitor, in patients with advanced solid tumors: results from a

phase I study

AUTHOR (S):

Liu, Glenn; Rugo, Hope S.; Wilding, George; McShane, Teresa M.; Evelhoch, Jeffrey L.; Ng, Chaan; Jackson, Edward; Kelcz, Frederick; Yeh, Benjamin M.; Lee, Fred T., Jr.; Charnsangavej, Chusilp; Park, John W.; Ashton, Edward A.; Steinfeldt, Heidi M.; Pithavala, Yazdi K.; Reich, Steven D.; Herbst, Roy S.

CORPORATE SOURCE:

Comprehensive Cancer Center, University of Wisconsin,

Madison, WI, USA

SOURCE:

Journal of Clinical Oncology (2005), 23(24), 5464-5473

CODEN: JCONDN; ISSN: 0732-183X

PUBLISHER:

American Society of Clinical Oncology

Journal DOCUMENT TYPE: English LANGUAGE:

Entered STN: 28 Sep 2005 ED AB

Purpose: Identifying suitable markers of biol. activity is important when assessing novel compds. such as angiogenesis inhibitors to optimize the dose and schedule of therapy. Here we present the pharmacodynamic response to acute dosing of AG-013736 measured by dynamic contrast-enhanced magnetic resonance imaging (DCE-MRI). Patients and Methods: Thirty-six patients with advanced solid tumors were treated with various doses of AG-013736. In addition to standard measures of objective disease response and pharmacokinetic anal., DCE-MRI scans were acquired at baseline and repeated at cycle 1-day 2 after the scheduled morning dose of the AG-013736 in 26 patients. Indicators of a vascular response, such as the volume transfer constant (Ktrans) and initial area under the curve (IAUC), were calculated to assess the effect of treatment on tumor vascular function. Results: Evaluable vascular response data were obtained in 17 (65%) of 26 patients. A linear correlation was found in which the percentage change from baseline to day 2 in Ktrans and IAUC was inversely proportional to AG-013736 exposure. Using a conservative a priori assumption that a ≥50% decrease in Ktrans was indicative of an objective vascular response, a 50% decrease in Ktrans was achieved and corresponded to a plasma AUCO-24 of > 200 ng · h/mL. Conclusion: A sufficient decrease in tumor vascular parameters was observed at a dose chosen for addnl. phase II testing by conventional toxicity criteria. In addition, the

day 2 vascular response measured using DCE-MRI seems to be a useful indicator of drug pharmacol., and addnl. research is needed to determine if it is a suitable marker for predicting clin. activity.

IT 319460-85-0, AG 013736

RL: PAC (Pharmacological activity); PKT (Pharmacokinetics); THU (Therapeutic use); BIOL (Biological study); USES (Uses) (angiogenic inhibitor AG-013736 dose measured by DCE-MRI was effective with decreased tumor vascular response parameters Ktrans, IAUC and increased pharmacokinetic parameters Cmax, AUC in patient with advanced solid tumor)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT: 33 THERE ARE 33 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 12 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 12

ACCESSION NUMBER: 2004:1059176 CAPLUS

DOCUMENT NUMBER: 142:32986

TITLE: Use of a c-abl-, PDGFR-, or c-kit-tyrosine kinase

inhibitor for the treatment of diabetes

INVENTOR(S): Hagerkvist, Robert Per; Welsh, Nils Richard

PATENT ASSIGNEE(S): Swed.

SOURCE: PCT Int. Appl., 22 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PAT	PATENT NO.					<b>D</b> .	DATE		j	APPLICATION NO.						DATE			
	2004				A2 A3		2004: 2005:		1	WO 2	004-1	EP56'	79	<b></b>	20040526				
	W:	ΑE,	AG,	AL,	AM,	ΑT,	AU,	AZ,	BA,	BB,	BG,	BR,	BW,	BY,	ΒZ,	CA,	CH,		
		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,		
1		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	ΚP,	KR,	ΚZ,	LC,		
•		LK,	LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	ΜZ,	NA,	NI,		
		NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,		
		TJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	zw		
	RW:	BW,	GH,	GM,	KE,	LS,	MW,	MZ,	NA,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,		
		ΑZ,	BY,	KG,	ΚZ,	MD,	RU,	ТJ,	TM,	ΑT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,		
		EE,	ES,	FI,	FR,	GB,	GR,	HU,	ΙE,	IT,	LU,	MC,	NL,	PL,	PT,	RO,	SE,		
		SI,	SK,	TR,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,		

SN, TD, TG AU 2004243491 **A1** 20041209 AU 2004-243491 20040526 CA 2526594 AA 20041209 CA 2004-2526594 20040526 EP 1631291 Α2 20060308 EP 2004-739375 20040526 AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK, HR 20040526 BR 2004010704 Α 20060613 BR 2004-10704 20040526 CN 1794995 Α 20060628 CN 2004-80014278 NO 2005006188 20051223 NO 2005-6188 20051223 PRIORITY APPLN. INFO.: GB 2003-12086 20030527 GB 2004-2682 20040206 WO 2004-EP5679 20040526

ED Entered STN: 10 Dec 2004 GI

AB The invention discloses the use of a c-Abl-,PDGFR-, or c-kit-tyrosine kinase inhibitor, e.g. I, or a pharmaceutically acceptable salt thereof, for the manufacture of a medicament for the treatment of diabetes, including type I or type II diabetes.

Ι

IT 319460-85-0

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL
(Biological study); USES (Uses)
 (c-abl-, PDGFR-, or c-kit-tyrosine kinase inhibitor for treatment of diabetes)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2~[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

L23 ANSWER 13 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 13

```
ACCESSION NUMBER: 2004:965067 CAPLUS
```

DOCUMENT NUMBER: 141:406039

TITLE: Combinations for the treatment of diseases involving

cell proliferation, migration or apoptosis of myeloma

cells, or angiogenesis

INVENTOR(S): Hilberg, Frank; Solca, Flavio; Stefanic, Martin

Friedrich; Baum, Anke; Munzert, Gerd; Van Meel,

Jacobus C. A.

PATENT ASSIGNEE(S): Boehringer Ingelheim International G.m.b.H., Germany;

Boehringer Ingelheim Pharma G.m.b.H. & Co. K.-G.

SOURCE: PCT Int. Appl., 101 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 2

PATENT INFORMATION:

	PA	CENT I	NO.			KIN	<b>o</b> :	DATE	ATE			APPLICATION NO				DATE			
						A2 20041111 A3 20041216			1	WO 2	004-	EP43	20040424						
	***	W:							AZ,	RΔ	BB	R.G	BR	RW	RY	B7.	CA.	СН	
		•••	•	•		•			DM,						•	•	•		
			•	•	•	•			IN,	•		•	•		•	•	•		
				•	,	•	•		MD,	•	•	•	•		•				
			•	•		•		•	RO,			•							
				•					UG,							-		•	
		RW:							MZ,									AM,	
			AZ,	BY,	KG,	KZ,	MD,	RU,	TJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	
									HU,										
			SI,	SK,	TR,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	
			SN,	TD,	TG														
	ΕP	1473	A1 20041103					EP 2	003-	9587	20030429								
		R:	ΑT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	ΙT,	LI,	LU,	NL,	SE,	MC,	PT,	
			ΙE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	ΑL,	TR,	BG,	CZ,	EE,	HU,	SK		
	ΑU	2004	2335	76		A1 20041111					AU 2	004-	2335	20040424					
	CA	A 2523868					AA 20041111												
	ΕP					A2 20060208													
		R:							FR,						NL,	SE,	MC,	PT,	
									BG,							_			
						A 20060425									20040424				
						A 20051128													
PRIOR	RIORITY APPLN. INFO.:																0030		
																-	0040		
												2004-1171 2004-EP4363					0040		
						0.0					wo 2	004 -	EP43	63	,	w 2	0040	424	

ED Entered STN: 12 Nov 2004

The present invention relates to a pharmaceutical combination for the treatment of diseases which involves cell proliferation, migration or apoptosis of myeloma cells, or angiogenesis. The invention also relates to a method for the treatment of said diseases, comprising co-administration of effective amts. of specific active compds. and/or co-treatment with radiation therapy, in a ratio which provides an additive and synergistic effect, and to the combined use of these specific compds. and/or radiotherapy for the manufacture of corresponding pharmaceutical combination prepns. The pharmaceutical combination can include selected protein tyrosine kinase receptor antagonists and further chemotherapeutic or naturally occurring semisynthetic or synthetic agents.

IT 319460-85-0

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL

(Biological study); USES (Uses)

(drug combinations for diseases involving cell proliferation and migration or apoptosis or angiogenesis including protein tyrosine kinase receptor antagonists and radiotherapy)

RN 319460-85-0 CAPLUS

Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-CN yl]thio] - (9CI) (CA INDEX NAME)

Double bond geometry as shown.

CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 14 L23 ANSWER 14 OF 22

ACCESSION NUMBER:

2004:905786 CAPLUS 141:391040

DOCUMENT NUMBER: TITLE:

Crystal structure of human VEGFR2 kinase domain-ligand

complexes and use of the atomic coordinates in drug

discovery

INVENTOR(S):

Bender, Steven Lee; Kania, Robert Steven; McTigue, Michele Ann; Palmer, Cynthia Louise; Pinko, Chris;

Wickersham, John

PATENT ASSIGNEE(S):

Pfizer Inc., USA

SOURCE:

PCT Int. Appl., 332 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATE	PATENT NO.						DATE	ATE APPLIC				CATION NO.				DATE			
WO 2	WO 2004092217					A1 20041028			١	WO 20	004-	IB12	51	20040405					
	W:	ΑE,	AG,	AL,	AM,	ΑT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BW,	BY,	ΒZ,	CA,	CH,		
		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,		
		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KΕ,	KG,	KP,	KR,	ΚZ,	LC,		
		LK,	LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NA,	NI,		
		NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,		
		ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UΖ,	VC,	VN,	YU,	ZA,	ZM,	ZW		
	RW:	BW,	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	ΑŻ,		
		BY,	KG,	KZ,	MD,	RU,	ТJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,		
		ES,	FI,	FR,	GB,	GR,	HU,	ΙE,	IT,	LU,	MC,	NL,	PL,	PT,	RO,	SE,	SI,		
		SK,	TR,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	ΝE,	SN,		
		TD,	TG																
EP 1	618	133			A1 20060125					EP 2004-725768					20040405				
	R:	ΑT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,		
		ΙE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	AL,	TR,	BG,	CZ,	EE,	HU,	PL,	SK,	HR	
US 2	2005	1974	92		A1		2005	0908	1	US 2004-824982					20040415				
PRIORITY APPLN. INFO.: US 2003-463957P P 200												0030	417						

WO 2004-IB1251

W 20040405

ED Entered STN: 29 Oct 2004

Polypeptides containing the kinase domain of human vascular endothelial growth AB factor receptor tyrosine kinase (VEGFR) are described. Also described are crystal structures of these polypeptides, including the crystal structures of VEGFR2 kinase domain-ligand complexes. The atomic coordinates derived from the crystal structures provide a three-dimensional description of the ligand-binding pocket of the kinase domain useful in drug discovery and design for the identification and design of modulators of kinase activity.

319460-85-0DP, complexes with VEGFR2 kinase domain IT

RL: BPN (Biosynthetic preparation); BSU (Biological study, unclassified); BUU (Biological use, unclassified); PRP (Properties); BIOL (Biological study); PREP (Preparation); USES (Uses)

(crystal structure of human VEGFR2 kinase domain-ligand complexes and use of atomic coordinates in drug discovery)

RN 319460-85-0 CAPLUS

Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-CN yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT: 17 THERE ARE 17 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 15 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 16

ACCESSION NUMBER:

2004:618309 CAPLUS

DOCUMENT NUMBER:

142:86940

TITLE:

Inhibition of vascular endothelial growth factor (VEGF) signaling in cancer causes loss of endothelial

fenestrations, regression of tumor vessels, and

appearance of basement membrane ghosts

AUTHOR (S):

Inai, Tetsuichiro; Mancuso, Michael; Hashizume, Hiroya; Baffert, Fabienne; Haskell, Amy; Baluk, Peter;

Hu-Lowe, Dana D.; Shalinsky, David R.; Thurston, Gavin; Yancopoulos, George D.; McDonald, Donald M.

CORPORATE SOURCE: Cardiovascular Research Institute, Comprehensive Cancer Center, and Department of Anatomy, University

of California, San Francisco, CA, USA

SOURCE:

American Journal of Pathology (2004), 165(1), 35-52

CODEN: AJPAA4; ISSN: 0002-9440

PUBLISHER: American Society for Investigative Pathology

DOCUMENT TYPE: Journal LANGUAGE: English Entered STN: 03 Aug 2004

Angiogenesis inhibitors are receiving increased attention as cancer AB therapeutics, but little is known of the cellular effects of these inhibitors on tumor vessels. We sought to determine whether two agents, AG013736 and VEGF-Trap, that inhibit vascular endothelial growth factor (VEGF) signaling, merely stop angiogenesis or cause regression of existing tumor vessels. Here, we report that treatment with these inhibitors caused robust and early changes in endothelial cells, pericytes, and basement membrane of vessels in spontaneous islet-cell tumors of RIP-Tag2 transgenic mice and in s.c. implanted Lewis lung carcinomas: Strikingly, within 24 h, endothelial fenestrations in RIP-Tag2 tumors disappeared; vascular sprouting was suppressed, and patency and blood flow ceased in some vessels. By 7 days, vascular d. decreased more than 70%, and VEGFR-2 and VEGFR-3 expression was reduced in surviving endothelial cells. Vessels in Lewis lung tumors, which lacked endothelial fenestrations, showed less regression. In both tumors, pericytes did not degenerate to the same extent as endothelial cells, and those on surviving tumor vessels acquired a more normal phenotype. Vascular basement membrane persisted after endothelial cells degenerated, providing a ghost-like record of pretreatment vessel number and location and a potential scaffold for vessel regrowth. The potent anti-vascular action observed is evidence that VEGF signaling inhibitors do more than stop angiogenesis. Early loss of endothelial fenestrations in RIP-Tag2 tumors is a clue that vessel phenotype may be predictive of exceptional sensitivity to these inhibitors.

IT 319460-85-0

CN

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(AGO13736 inhibited vascular endothelial growth factor signaling in cancer and caused loss of endothelial fenestrations, regression of tumor vessels, and appearance of basement membrane ghosts in mouse)

RN 319460-85-0 CAPLUS

Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT:

53 THERE ARE 53 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L23 ANSWER 16 OF 22 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 17 ACCESSION NUMBER: 2001:31473 CAPLUS

ACCESSION NUMBER: DOCUMENT NUMBER:

134:100864

TITLE:

Indazole compounds and pharmaceutical compositions for inhibiting protein kinases, and methods for their use

Kania, Robert Steven; Bender, Steven Lee; Borchardt, Allen J.; Braganza, John F.; Cripps, Stephan James; Hua, Ye; Johnson, Michael David; Johnson, Theodore Otto, Jr.; Luu, Hiep The; Palmer, Cynthia Louise; Reich, Siegfried Heinz; Tempczyk-russell, Anna Maria; Teng, Min; Thomas, Christine; Varney, Michael David;

INVENTOR(S):

Wallace, Michael Brennan

PATENT ASSIGNEE(S):

Agouron Pharmaceuticals, Inc., USA

SOURCE:

PCT Int. Appl., 439 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.					KIND DATE							DATE							
WO	2001002369																		
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BB	, BG,	BR,	BY,	CA,	CH,	, CN,	CR,		
		CU,	CZ,	DE,	DK,	DM,	DZ,	EE,	ES,	FI	, GB,	GD,	GE,	GH,	GM,	, HR,	HU,		
		ID,	IL,	IN,	IS,	JP,	KE,	KG,	ΚP,	KR	, KZ,	LC,	LK,	LR,	LS	, LT,	LU,		
		LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	NO	, NZ,	PL,	PT,	RO,	RU,	, SD,	SE,		
																, ZA,			
	RW:	GH,	GM,	ΚE,	LS,	MW,	MZ,	SD,	SL,	SZ	, TZ,	ŪG,	ZW,	ΑT,	BE,	, CH,	CY,		
		DE,	DK,	ES,	FI,	FR,	GB,	GR,	ΙE,	IT	, LU,	MC,	NL,	PT,	SE	, BF,	ВJ,		
		CF,	CG,	CI,	CM,	GA,	GN,	GW,	ML,	MR	, NE,	SN,	TD,	TG					
	CA 2383630					AA 20010111				CA 2000-2383630						20000630			
BR	2000012352				A 20020514					2000-	1235		20000630						
EP	1218															20000			
	R:											LI,	LU,	NL,	SE,	, MC,	PT,		
							RO,												
JP	2003	5034	81		T2		2003	0128		JP	2001-	5078	09		- 2	20000	630		
NZ	5166	76			Α		2003	0926		ΝZ	2000-	5166	76		2	20000	630		
CN	1495	171			Α											20000			
																20000			
EP	1614										2005-					20000			
	R:											LI,	LU,	ΝL,	SE	, MC,	PT,		
		ΙE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	AL									
NO	2001	0057	97		Α		2002	0301		ИО	2001-	5797			2	20011 20011	128		
		0100	61		Α		2003	0206		ZA	2001-	1006	1		2	20011	206		
	1063	80			Α		2002	0930		BG	2002-	1063	80		2	20020	201		
																20030			
US	2004	1716	34		A1		2004	0902		US	2003-	3267	55		- 3	20030	213		
	6884				В2		2005	0426											
IORIT	ORITY APPLN. INFO.:									US	1999-	1421	30P		P :	19990 20000	702		
										EP	2000-	9433	75		A3 2	20000	630		
																20000			
											2000-					20000			
										US	2001-	9837	86		A3 2	20011	025		
HED CO	IED SOURCE(S).					рδπ	774.	ገበበዩ	5 <i>1</i>										

OTHER SOURCE(S): MARPAT 134:100864

ED Entered STN: 12 Jan 2001

GI

AB Indazole compds. I [R1 = substituted or unsubstituted aryl or heteroaryl, R3CH:CH, R3N:CH; R2 = substituted or unsubstituted aryl, heteroaryl, Y-X; R3 = substituted or unsubstituted alkyl alkenyl, cycloalkyl,

heterocycloalkyl, aryl, heteroaryl; Y = O, S, C(:CH2), CO, SO, SO2, alkylidene, NH, N(C1-C8 alkyl); X = substituted or unsubstituted aryl, heteroaryl, NH(alkyl), NH(cycloalkyl), NH(heterocycloalkyl), NH(aryl), NH(heteroaryl), NH(alkoxy), NH(dialkylamide)] and their pharmaceutically acceptable prodrugs, active metabolites, and salts are disclosed. The compds. modulate and/or inhibit the activity of certain protein kinases. In particular, I and pharmaceutical compns. containing them are capable of mediating tyrosine kinase signal transduction, and thereby modulate and/or inhibit unwanted cell proliferation. The invention is also directed to the therapeutic or prophylactic use of pharmaceutical compns. containing such compds., and to methods of treating cancer and other disease states associated with unwanted angiogenesis and/or cellular proliferation, such as diabetic retinopathy, neovascular glaucoma, rheumatoid arthritis, and psoriasis, by administering effective amts. of such compds. E.g., I [R1 = (E) - 3, 4 - (MeO) 2C6H3CH:CH; R2 = 4 - HO - 3 - MeOC6H3] (II) was prepared from 6-aminoindazole by diazotization and substitution with iodide, protection of the indazole nitrogen with 2,4,6-Me3C6H2SO2Cl, coupling of the regioisomeric mixture with 4-(methoxymethoxy)-3-methoxybenzeneboronic acid in the presence of dichlorobis(triphenylphosphine)palladium, and deprotection of the indazole moiety and iodination at the 3-position of the indazole. Treatment of the 3-indazolyl iodide with sec-butyllithium, phenyllithium, and DMF, regioselective protection of the indazole with 2,4,6-Me3C6H2SO2Cl, olefination with 3,4-dimethoxybenzyltriphenylphosphoni um bromide, deprotection of the indazole, deprotection of the methoxymethyl group, and equilibration of the double bond with iodine gave II. Biol. data on protein kinase inhibition, cell proliferation inhibition, neovascularization inhibition, and i.p. and oral bioavailability, are given.

IT 319460-85-0P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of aryl-substituted indazole derivs. as modulators and inhibitors of protein kinases in the treatment of tumor growth, cellular proliferation, and angiogenesis)

RN 319460-85-0 CAPLUS

CN Benzamide, N-methyl-2-[[3-[(1E)-2-(2-pyridinyl)ethenyl]-1H-indazol-6-yl]thio]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

L23 ANSWER 17 OF 22 TOXCENTER COPYRIGHT 2006 ACS on STN DUPLICATE 15 ACCESSION NUMBER: 2004:238078 TOXCENTER

Copyright 2006 ACS COPYRIGHT: CA14120337772Q DOCUMENT NUMBER:

Pharmaceutical dosage forms comprising AG 013736 TITLE:

Freddo, James Lawrence; Hu-Lowe, Dana; Pithavala, Yazdi AUTHOR (S):

Kersi; Steinfeldt, Heidi Marie

ASSIGNEE: Pfizer Inc. CORPORATE SOURCE:

WO 2004087152 A1 14 Oct 2004 PATENT INFORMATION: (2004) PCT Int. Appl., 35 pp. SOURCE:

CODEN: PIXXD2.

UNITED STATES COUNTRY:

DOCUMENT TYPE: Patent CAPLUS FILE SEGMENT:

CAPLUS 2004:857398 OTHER SOURCE:

English LANGUAGE:

ENTRY DATE: Entered STN: 26 Oct 2004

Last Updated on STN: 30 May 2006

ABSTRACT:

The invention provides pharmaceutical dosage forms of AG 013736 or salts, solvates or prodrugs. The invention further provides methods of treating abnormal cell growth, such as cancers, by administering the dosage forms to a mammal. A high-dose combination therapy of AG 013736 ad docetaxel generates greater delay of primary tumor growth and metastasis than either monotherapy alone.

CLASSIFICATION CODE: 63-6

SUPPLEMENTARY TERMS: Miscellaneous Descriptors

AGO 13736 pharmaceutical antitumor

80449-01-0 (Topoisomerase) REGISTRY NUMBER:

114977-28-5 (Docetaxel)

319460-85-0; 771570-72-0; 108334-68-5 REGISTRY NUMBER:

L23 ANSWER 18 OF 22 PROUSDDR COPYRIGHT 2006 PROUS SCIENCE on STN

PROUSDDR ACCESSION NUMBER: 2003:98

DOCUMENT NUMBER: 318296

N-Methyl-2-(3-(2-(2-pyridyl)vinyl)-1H-indazol-6-CHEMICAL NAME:

ylsulfanyl)benzamide

DRUG NAME: AG-013736

AG-13736

GENERIC NAME: Axitinib (Prop INN, USAN)

CAS REGISTRY NUMBER: 319460-85-0 MOLECULAR FORMULA: C22 H18 N4 O S

Actively Investigated

HIGHEST DEV. PHASE: PHASE II ORIGINATOR: Pfizer

Breast Cancer Therapy; Pancreatic Cancer Therapy; CLASSIFICATION CODE:

> Renal Cancer Therapy Angiogenesis Inhibitors

ACTION MECHANISM: OTHER SOURCE: SYNTHLINE 2004000274 ENTRY DATE: Entered STN: 9 May 2004

Last Updated on STN: 4 Aug 2006

STRUCTURE:

STATUS:

PROUS REFERENCES:

RefID: 740156 (Text Available)

Drug Data Report, Vol. 25, No. 7, pp 657, 2003

REFERENCE TEXT:

RefID: 740156

ACTION - Potent, selective and orally active inhibitor of VEGFR/PDGFR (vascular endothelial growth factor receptor/platelet-derived growth factor receptor) tyrosine kinases, currently in phase I clinical trials in patients with advanced solid tumors. It inhibited VEGFR1 and VEGFR2 tyrosine kinases (Ki = 2.6 and 3.7 nM, respectively), VEGF-induced phosphorylation of VEGFR2 (IC50 = 7.2 nM) and MAPK in human umbilical vein endothelial cells (HUVEC). It also inhibited VEGFR2 and PDGFRbeta phosphorylation in rat retina and human tumor xenografts following single oral doses, as well as VEGF-induced skin vascular leakage in mice when administered as single oral doses of 0.3-10 mg/kg. Compound exhibited broad antitumor activity in preclinical xenograft models of human colon carcinoma MV522 (3-100 mg/kg b.i.d.), murine Lewis lung carcinoma (ED50 = 1.2 mg/kg b.i.d.), breast carcinoma BT-474 and melanoma, inhibiting tumor growth,

angiogenesis and metastasis.

PATENT REFERENCES:

INVENTOR(S):

TITLE: Indazole compounds and pharmaceutical compositions for

inhibiting protein kinases, and methods for their use Luu, H.T.; Varney, M.D.; Palmer, C.L.; Reich, S.H.;

Teng, M.; Bender, S.L.; Cripps, S.J.; Johnson, M.D.; Thomas, C.; Wallace, M.B.; Johnson, T.O. Jr.; Kania,

R.S.; Borchardt, A.J.; Braganza, J.F.; Hua, Y.;

Tempczyk-Russell, A.M.

PATENT ASSIGNEE(S):

Agouron

PATENT INFORMATION:

EP 1614683 20060111 JP 2003503481 20030128

WO 2001002369 20010111

PRIORITY INFORMATION:

US 1999-142130 19990702

TITLE:

Dosage forms comprising AG013736

INVENTOR(S):

Freddo, J.L.; Hu-Lowe, D.; Pithavala, Y.K.;

Steinfeldt, H.M.

PATENT ASSIGNEE(S):

Pfizer

PATENT INFORMATION:

EP 1613320 20060111 US 2004224988 20041111 WO 2004087152 20041014

PRIORITY INFORMATION:

US 2003-460695 20030403

Page 42

US 2003-491771 20030731 US 2004-816242 20040401

TITLE: Polymorphic forms of 6-(2-

(methylcarbamoyl)phenylsulfanyl)-3-E-(2-(pyridin-2-

yl)ethenyl)indazole

INVENTOR(S): Zook, S.E.; Kania, R.S.; Ye, Q.; Ouellette, M.; Hart,

R.M.; Wu, Z.P.

PATENT ASSIGNEE(S): Agouron

PATENT ASSIGNEE(S): Pfizer

PATENT INFORMATION: US 2006094763 20060504

WO 2006048751 20060511

PRIORITY INFORMATION: US 2004-624665 20041102

US 2005-264493 20051031

TITLE: Methods for preparing indazole compounds

INVENTOR(S): Dagnino, R. Jr.; Zook, S.E.; Babu, S.; Tian, Q.;

Ouellette, M.A.; Shi, B.

PATENT ASSIGNEE(S): Pfizer

PATENT INFORMATION: WO 2006048745 20060511 PRIORITY INFORMATION: US 2004-624575 20041102

TITLE: Methods of preparing indazole compounds

INVENTOR(S): Yu, S.; Srirangam, J.K.; Mitchell, M.B.; Tian, Q.;

Shi, B.; Stankovic, N.S.; Ewanicki, B.L.; Flahive, E.J.; Kasparian, A.J.; Perry, M.D.; Sach, N.W.; Saenz,

J.E.; O'Neill-Slawecki, S.A.

PATENT ASSIGNEE(S): Agouron PATENT ASSIGNEE(S): Pfizer

PATENT INFORMATION: US 2006094881 20060504

WO 2006048744 20060511

PRIORITY INFORMATION: US 2004-624635 20041102

US 2005-717071 20050914 US 2005-264440 20051031

## REFERENCES:

(1) RefID: 663213, Periodic Publication
"Characterization of potency and activity of the VEGF/PDGF receptor
tyrosine kinase inhibitor AG013736"
Hu-Lowe, D.; Hallin, M.; Feeley, R.; et al., Proc Am Assoc Cancer Res
(AACR), Vol. 43, (Abst 5356), 2002

- RefID: 663215, Periodic Publication
   "Pharmacological activities of AG013736, a small molecule inhibitor of
   VEGF/PDGF receptor tyrosine kinases"
   Hu-Lowe, D.; Heller, D.; Brekken, J.; et al., Proc Am Assoc Cancer Res
   (AACR), Vol. 43, (Abst 5357), 2002
- (3) RefID: 739489, Periodic Publication
  "AG-013736, a novel VEGFR TK inhibitor, suppresses tumor growth and vascular permeability in human BT474 breast cancer xenografts in nude mice"
  Wilmes, L.J.; et al., Proc Am Assoc Cancer Res (AACR), Vol. 44, No. 2nd ed, (Abst 3772), 2003
- (4) RefID: 739490, Periodic Publication
  "Further characterization of the potent VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736 in preclinical tumor models for its antiangiogenesis and antitumor activity"
  Wickman, G.; et al., Proc Am Assoc Cancer Res (AACR), Vol. 44, No. 2nd

- ed, (Abst 3780), 2003
- (5) RefID: 770180, Periodic Publication
  "AG-013736, a potent VEGF/PDGF receptor tyrosine kinase inhibitor, is
  active against lymphoma growth and chemotherapy-induced vasculogenesis"
  Paul, S.; Foutz, T.J.; Calleri, A.; Gobbi, A.; Hu-Lowe, D.; Shalinsky,
  D.; Bertolini, F., Blood, Vol. 102, No. 11, Part 1, (Abst 2397), 2003
- RefID: 777449, Congress Literature
  "A phase I study of the VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736 in patients with advanced solid tumors: Safety, pharmacokinetics, and dceMRI"
  Herbst, R.; Rugo, H.; Liu, G.; Park, J.; Kies, M.; Pithavala, Y.; McShane, T.; Evelhoch, J.; Steinfeldt, H.; Reich, S.; Freddo, J.; Wilding, G., AACR-NCI-EORTC Int Conf Mol Targets Cancer Ther (15th Edition), Nov 17 2003-Nov 21 2003, Boston, (Abst C253)
- (7) RefID: 805000, Periodic Publication "The discovery of receptor tyrosine kinases: Targets for cancer therapy" Gschwind, A.; Fisher, O.M.; Ullrich, A., Nat Rev Cancer, Vol. 4, No. 5, pp 361, 2004
- RefID: 858955, Periodic Publication

  "Phase 2 study of the anti-angiogenesis agent AG-013736 in patients with poor prognosis acute myeloid leukemia (AML) or myelodysplastic syndrome (MDS)"

  Giles, F.J.; Steinfeldt, H.; Bellamy, W.T.; Bycott, P.; Pithavala, Y.; Reich, S.D.; List, A.F., Blood, Vol. 104, No. 11, Part 1, (Abst 1813), 2004
- (9) RefID: 900749, Congress Literature
  "AG-013736, a multi-target tyrosine kinase receptor inhibitor,
  demonstrates anti-tumor activity in a phase 2 study of
  cytokine-refractory, metastatic renal cell cancer (RCC)"
  Rini, B.; Rixe, O.; Bukowski, R.; et al., Annu Meet Am Soc Clin Oncol
  (ASCO) (41st Edition), May 13 2005-May 17 2005, Orlando, (Abst 4509)
- (10) RefID: 918062, Periodic Publication
  "Significant enhancement of anti-tumor efficacy of VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736 in combination with docetaxel in chemo-refractory and/or orthotopic xenograft tumor models in mice"
  Hu-Lowe, D.D.; Grazzini, M.L., Proc Am Assoc Cancer Res (AACR), Vol. 46, (Abst 2032), 2005
- (11) RefID: 926017, Congress Literature
  "Surrogate markers of activity of AG-013736, a multi-target tyrosine kinase receptor inhibitor, in metastatic renal cell cancer (RCC)"
  Rixe, O.; Meric, J.-B.; Bloch, J.; Gentile, A.; Mouawad, R.; Adam, V.; Buthiau, D.; Khayat, D., Annu Meet Am Soc Clin Oncol (ASCO) (41st Edition), May 13 2005-May 17 2005, Orlando, (Abst 3003)
- (12) RefID: 931236, Periodic Publication
  "Dynamic contrast-enhanced magnetic resonance imaging as a
  pharmacodynamic measure of response after acute dosing of AG-013736, an
  oral angiogenesis inhibitor, in patients with advanced solid tumors:
  Results from a phase I study"
  Liu, G.; et al., J Clin Oncol, Vol. 23, No. 24, pp 5464, 2005
- (13) RefID: 931237, Periodic Publication

- "Phase I trial of the oral antiangiogenesis agent AG-013736 in patients with advanced solid tumors: Pharmacokinetic and clinical results" Rugo, H.S.; et al., J Clin Oncol, Vol. 23, No. 24, pp 5474, 2005
- (14) RefID: 931410, Periodic Publication
  "PK/PD modeling based on mouse xenograft tumor growth inhibition and the correlation to clinical exposure for VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736"
  Yamazaki, S.; Grazzini, M.L.; Romero, D.; Amundson, K.; Pithavala, Y.; Hu-Lowe, D.D., Proc Am Assoc Cancer Res (AACR), Vol. 46, (Abst 3003), 2005
- (15) RefID: 938101, Periodic Publication
   "Playing dirty"
   Frantz, S., Nature, Vol. 437, No. 7061, pp 942, 2005
- (16) RefID: 945665, Congress Literature

  "A phase I/II study of AG-013736, an oral anti-angiogenesis agent, in combination with docetaxel in patients (pts) with metastatic breast cancer (MBC)"

  Rugo, H.S.; et al., Annu San Antonio Breast Cancer Symp (28th Edition), Dec 8 2005-Dec 11 2005, San Antonio, (Abst 1067)
- (17) RefID: 961738, Periodic Publication
   "Angiogenesis as a therapeutic target"
   Ferrara, N.; Kerbel, R.S., Nature, Vol. 438, No. 7070, pp 967, 2005
- (18) RefID: 979487, Company Communication
   "Treatment for patients with metastatic thyroid cancer (NCT00176748)"
   ClinicalTrials.gov Web Site, December 8, 2005
- (19) RefID: 1005277, Periodic Publication
  "Targeting angiogenesis with vascular endothelial growth factor
  receptor small-molecule inhibitors: Novel agents with potential in lung
  cancer"
  Wakelee, H.A.; Schiller, J.H., Clin Lung Cancer, Vol. 7, No. Suppl. 1,
  pp S31, 2005
- (20) RefID: 977848, Periodic Publication
  "VHL mutation and response to VEGF pathway-targeted therapy"
  Rini, B.I.; et al., Proc Am Assoc Cancer Res (AACR), Vol. 47, (Abst 1283), 2006
- (21) RefID: 979483, Company Communication "AG-013736 in combination with gemcitabine versus gemcitabine alone for patients with metastatic pancreatic cancer (NCT00219557)" ClinicalTrials.gov Web Site, March 20, 2006
- (22) RefID: 982897, Company Communication
  "Phase 2 study of AG-013736 in patients with refractory metastatic renal cell cancer (NCT00282048)"
  ClinicalTrials.gov Web Site, April 4, 2006
- (23) RefID: 990872, Periodic Publication
  "Inhibition of phosphorylation of the colony-stimulating factor-1
  receptor (c-Fms) tyrosine kinase in transfected cells by ABT-869 and
  other tyrosine kinase inhibitors"
  Guo, J.; Marcotte, P.A.; McCall, J.O.; Dai, Y.; Pease, L.J.;
  Michaelides, M.R.; Davidsen, S.K.; Glaser, K.B., Mol Cancer Ther, Vol.
  5, No. 4, pp 1007, 2006

```
(24) RefID: 996603, Company Communication
   "AG-013736 in combination with docetaxel versus docetaxel alone for
   patients with metastatic breast cancer (NCT00076024)"
   ClinicalTrials.gov Web Site, May 25, 2006
```

- (25) RefID: 999129, Periodic Publication
   "A phase II study of axitinib (AG-013736), a potent inhibitor of
   VEGFRs, in patients with advanced thyroid cancer"
   Kim, S.; et al., J Clin Oncol, Vol. 24, No. 18, Suppl., (Abst 5529),
   2006
- RefID: 1001146, Periodic Publication
  "The anti-angiogenesis agent, AG-013736, has minimal activity in elderly patients with poor prognosis acute myeloid leukemia (AML) or myelodysplastic syndrome (MDS)"
  Giles, F.J.; Bellamy, W.T.; Estrov, Z.; O'brien, S.M.; Verstovsek, S.; Ravandi, F.; Beran, M.; Bycott, P.; Pithavala, Y.; Steinfeldt, H.; Reich, S.D.; List, A.F.; Yee, K.W., Leuk Res, Vol. 30, No. 7, pp 801, 2006
- (27) RefID: 1012866, Company Communication
  "Pfizer reports Q2 2006 R&D highlights"
  Pfizer Press Release, July 20, 2006

START LOCAL KERMIT RECEIVE PROCESS

BINARY DATA HAS BEEN DOWNLOADED TO MULTIPLE FILES 'IMAGEnnn.TIF'

```
L23 ANSWER 19 OF 22 PHAR COPYRIGHT 2006 Informa UK Ltd on STN
AN
    30611 PHAR
DN
    036322
CN
    axitinib
CN
    AG-013736
CN
    CP-868596
    N-methyl-2-((3-((1E)-2-(pyridin-2-yl)ethenyl)-1H-indazol-6-
CN
    yl)sulfanyl)benzamide
RN
    319460-85-0
    C22 H18 N4 O S
MF
MW
    386.47
HAC
HD
LOGP 3.87
FRB 6
STA Active
CO
       | Company Name (Country) | Development Status
________
Originator OSI Pharmaceuticals (United Phase II Clinical Trial
        States)
-----
Licensee | Pfizer (United States) | Phase II Clinical Trial
SO
    Pharmaprojects. PJB Publications, T&F Informa UK Ltd, London
TX
    Axitinib (AG-013736; CP-868596) is a small-molecule, orally available
```

VEGF/PDGF receptor tyrosine kinase inhibitor under development by OSI

Pharmaceuticals and Pfizer for the treatment of cancer.

## Marketing

Axitinib was discovered through a collaboration between OSI and Pfizer.

Clinical

#### Phase II

In a multicentre Phase II trial in 52 metastatic renal cell cancer (RCC) patients, who had previously failed cytokine-based therapy, axitinib 5mg was well tolerated and had a significant objective response rate. Partial response to treatment was 46% and stable disease was experienced by 40% of patients, with a median follow-up of 12mth. No moderate or severe myelosuppression was observed; however, 31% had progressive disease, 13% have withdrawn due to adverse events and 1 PR patient relapsed. It is in Phase II trials for metastatic melanoma, refractory thyroid cancer and nsclc, as well as in combination with docetaxel in breast cancer (41st ASCO (Orlando), 2005).

### Preclinical

In preclinical xenograft models, axitinib po bid inhibited angiogenesis, tumour growth and metastasis. Greater antitumour efficacy was achieved with co-administration with docetaxel cf either agent alone. In mice, t1/2 was 2hr and maximal antitumour efficacy was achieved with po administration once-daily (94th AACR (Washington, DC), 2003, Abs 3772 and 3780). Updated by LK on 28/6/2005.

```
DSTA World: Phase II Clinical Trial
     United States: Phase II Clinical Trial
```

CC Anticancer, other

Indication: Cancer, renal (Phase II Clinical Trial); Cancer, breast
(Phase II Clinical Trial); Cancer, melanoma (Phase II Clinical CTTrial); Cancer, lung, non-small cell (Phase II Clinical Trial); Cancer, thyroid (Phase II Clinical Trial)

LOCUSID: 3791. Target Gene: kinase insert domain receptor (a type III GEN receptor tyrosine kinase)

Synonyms: KDR; FLK1; VEGFR2; VEGF receptor-2 tyrosine kinase; VEGFR-2 tyrosine kinase; vascular endothelial growth factor receptor 2

LOCUSID: 5156. Target Gene: platelet-derived growth factor receptor, alpha polypeptide

Synonyms: PDGFRA; CD140a; PDGFR2; PDGFR kinase, bcr fusion-linked; PDGFR/bcr fusion, PDGFR component; PDGF receptor kinase, bcr fusion-linked; platelet-derived growth factor receptor tyrosine kinase, bcr fusion-linked; PDGFR alpha; PDGF receptor alpha; MGC74795

ORGM CH-SY (Chemical, synthetic)

```
RTE A-PO (Alimentary, po)
```

RDAT 20050628 RNTE ##Actual; New Chemical Structure New 20050628 ##Estimated; Names Granted AG-013736 ##Estimated; Change in Status Phase II Clinical Trial
##Estimated; New Indication Cancer, breast, melanoma, 20050515 20050515 thyroid, nsclc and renal 20040517 ##Actual; Change in Status Phase I Clinical Trial ##Actual; New Product in Pharmaprojects 20030716

NRAT 5: Novelty Rating - 2nd, 3rd or 4th Compound

MRAT 3: Market Rating - US\$ 2001-5000 million

SRAT 4:Speed Rating - Faster than Average

TRAT 12: Total Rating - Total Rating

PHCD KI-GFEN-AN; Endothelial growth factor receptor kinase inhibitor; Enzyme, Transferase, Endothelial growth factor receptor kinase inhibitor; VEGFR kinase inhibitor; VEGF receptor tyrosine kinase inhibitor; E-TR-KI-GFEN-AN.

PHCD KI-GFPL-AN; Platelet-derived growth factor receptor kinase inhibitor; Enzyme, Transferase, Plateletderived growth factor receptor kinase inhibitor; Platelet-derived growth factor kinase inhibitor; PDGF receptor kinase inhibitor; PDGF kinase inhibitor; E-TR-KI-GFPL-AN; 2.7.1.

PHCD E; E-TR; E-TR-KI; E-TR-KI-GFEN; E-TR-KI-GFEN-AN; E-KI; E-KI-GFEN; E-KI-GFEN-AN; E-GFEN; E-GFEN-AN; E-AN; TR; TR-KI; TR-KI-GFEN; TR-KI-GFEN-AN; TR-GFEN-AN; TR-AN; KI-GFEN; KI-GFEN-AN; KI-AN; GFEN; GFEN-AN; E-TR-KI-AN; E-KI-AN; E-TR-KI-AN; E-TR-AN; E-TR-KI-GFPL; E-TR-KI-GFPL-AN; E-KI-GFPL; TR-GFPL-AN; KI-GFPL; KI-GFPL-AN; GFPL; GFPL-AN; GFPL; KI-GFPL-AN; GFPL; GFPL-AN; KI-GFPL; KI-GFPL-AN; GFPL; GFPL-AN; KI-GFPL; KI-GFPL-AN; GFPL; GFPL-AN; KI-GFPL; KI-GFPL-AN; CFPL; GFPL-AN; CFPL; CFPL-AN; CFPL; CFPL-AN; CFPL; CFPL-AN; CFPL; CFPL-AN; CFPL; CFPL-AN; CFP

LN

Therapy (CC) | Pharmacology (PHCD) | Status (DSTC)

K6Z | KI-GFEN-AN KI-GFPL-AN C2

LCDAT 20050628: LK : Granting of USAN and chemical structure reported

Double bond geometry as shown.

L23 ANSWER 20 OF 22 ADISINSIGHT COPYRIGHT (C) 2006 Adis Data Information BV

on STN

ACCESSION NUMBER:

2002:507 ADISINSIGHT

SOURCE:

Adis R&D Insight

DOCUMENT NO:

017408

CHANGE DATE:

Jun 27, 2006

GENERIC NAME:

Axitinib

SYNONYM:

AG 013736; AG 13736; AG-13;736

CHEMICAL NAME:

N-Methyl-2-((3-((1E)-2-(pyridin-2-yl))ethenyl)-1H-indazol-

6-yl)sulfanyl)benzamide

MOLECULAR FORMULA:

C22 H18 N4 O S

CAS REGISTRY NO.:

319460-85-0

STRUCTURE:

Double bond geometry as shown.

EPHMRA ATC CODE:

L1 Antineoplastics

WHO ATC CODE:

L01 Antineoplastic Agents

HIGHEST DEV. PHASE:

Phase II

### CURRENT DEVELOPMENT STATUS:

Phase II, United States, Solid tumours Phase I, United States, Breast cancer

COMPANY INFORMATION

ORIGINATOR:

Pfizer (United States)

PARENT:

Pfizer

OTHER SOURCES:

801029751; 800883358; 801011782

WORD COUNT:

756

### TEXT

### Introduction:

Pfizer is developing axitinib (AG 013736, AG 13736), a small molecule inhibitor of vascular endothelial growth factor receptor (VEGF) and platelet-derived growth factor (PDGF) receptor tyrosine kinases. It may have potential in the treatment of a variety of solid tumour types.

## Key development milestones

In November 2004, Pfizer initiated a phase II study of axitinib in solid tumour patients with breast and renal cancers/1/.

Pfizer has conducted a phase I, dose-escalation study of axitinib in 30 patients with advanced solid tumours. Pfizer presented the results of the study at the AACR-NCI-EORTC International Conference on Molecular Targets and Cancer Therapeutics (AACR-NCI-EORTC-2003) in November 2003.

# COMMERCIAL SUMMARY:

Cancer / VEGF receptor inhibitor

Company Region Launch Date Peak Sales Patent Expiry

Pfizer Wrld 2009 \$750m

Constitute (C) Tabusa Duathana Tabasantianal All wights was award

Copyright (C) Lehman Brothers International. All rights reserved.

# PHARMACOLOGY OVERVIEW: Antimicrobial activity:

Pharmacodynamics:

Produces dose-dependent inhibition of human colorectal cancer xenografts; inhibits metastasis to lymph nodes and lung in an orthotopic melanoma model; decreases tumour vascular response; enhances tumour growth delay when co-administered with docetaxel in mice

Mechanism of action:

Platelet-derived growth factor receptor tyrosine kinase inhibitors
Tyrosine kinase inhibitors

Platelet-derived growth factor antagonists
Protein kinase inhibitors
Growth factor antagonists
Kinase inhibitors
Enzyme inhibitors

Vascular endothelial growth factor agonists
Growth factor agonists
Angiogenesis inhibitors
Activity versus parent drug: unspecified parent

## CLINICAL OVERVIEW:

Route(s) of Administration: PO
Administration Freq.(per day):
Adverse events:
occasional: Anaemia, Neutropenia.
Drug Interactions:
Unknown.

## Adverse Events:

Preclinical studies: in xenografts tumour models in mice, co-administration of axitinib and docetaxel was well tolerated in general, although a slight increase in bodyweight loss was noted in the combination group, compared with those treated with axitinib alone/2/.

Clinical studies: the dose-limiting toxicity (DLT) associated with axitinib at doses <= the mean tolerated dose (MTD) (5mg BD in fed patients) was grade 1 stomatitis, which was observed in one patient treated in the phase I, dose-escalation study conducted in 30 patients with advanced solid tumours. Non-dose-limiting hypertension, which was manageable with regular antihypertensive therapy, was observed in 5/12 patients. DLTs in patients treated with > the MTD were hypertension, seizures, elevated liver enzymes, pancreatitis, apnea, and stomatitis. Fatal hemotysis was also observed in two responding patients with non-small cell lung cancer, one case was 3 weeks after treatment was stopped. Non-dose limiting proteinuria was also observed/3/. In a phase I/II trial of axitinib in combination with docatexel, the major adverse events were grade 3/4 neutropenia (n=3) and grade 3/4 anaemia (3)/4/. Drug Interactions:

### PHARMACOLOGY:

Pharmacokinetics:

Axitinib exhibited variable (39-96% CV) but linear plasma pharmacokinetics in a phase I, dose-escalation study conducted in 30 patients with advanced solid tumours. Axitinib was administered orally once or twice daily on a 28 days cycle. Peak concentrations of the drug were observed 2-4 hours post-dose. The terminal plasma t sub(1/2) was 3-5 hours. Fasted patients (no food/beverages within 2 hours of dosing) had approximately 49% higher plasma exposure levels compared with fed patients. Intra-patient variability was also reduced in fasted versus fed patients. The C sub(max) and AUC on day 15 were 54.5 ng/mL

and 311 ng x h/mL, respectively, in fed patients treated with axitinib 5mg twice daily/3/.

Plasma profiles and PK values of axitinib were not influenced by the addition of docataxel to the therapeutic regimen for patients with metastatic breast cancer/4/.

Pharmacodynamics (Cancer):

Preclinical studies: axitinib produced dose-dependent inhibition of human MV522 colon cancer xenografts and Lewis lung cancer tumour in mice, with an ED sub(50) of 1.2 mg/kg twice daily. It also inhibited metastasis to the lymph nodes and lung in an orthotopic melanoma model/5/.

Significant enhancements in tumour growth delay were observed in vivo when axitinib (3-30 mg/kg, orally administered twice daily) was co-administered with docetaxel (40 mg/kg, administered intravenously once weekly), compared with axitinib alone or docetaxel alone (100%, 65% and 9% in the respective treatment groups). In addition, survival was prolonged following co-administration of axitinib (30 mg/kg) and docetaxel (40 mg/kg), compared with each agent alone (86% vs 23%)/2/.

Clinical studies: acute decreases in tumour vascular response (>= 50% decrease in K sup(trans) and the initial area under the contrast intensity X time curve (IAUC)) were observed in 6/18 evaluable patients in a trial using dceMRI. In addition, 11/18 patients demonstrated a >= 40% decrease in both IAUC and K sup(trans). The patients were enrolled in a phase I, dose-escalation study conducted in 30 patients with advanced solid tumours/3/.

### THERAPEUTIC TRIALS:

### Cancer:

The mean tolerated dose of axitinib was found to be 5mg twice daily in fed patients in a phase I, dose-escalation trial conducted in 30 patients with advanced solid tumours.

Renal cancer:two durable partial responses (assessed by RECIST criteria) were observed in patients with renal cancer and adenoid cystic carcinomas. Stable disease lasting 4 months to more than 13 months was also observed in 5 heavily pretreated patients/3/.

In a phase II study, axitinib had promising efficacy in patients with cytokine-refractory metastatic renal cell carcinoma. Forty-six percent of patients achieved a partial clinical response and 40% had stable disease. The median time to disease progression was not reached after 12-18 months of follow-up/6/.

Breast cancer: treatment with axitinib + docetaxel resulted in partial responses in 2 patients and stable disease in 3 for >= 4 months. Stable disease/response was maintained in 3 patients with single-agent axitinib after treatment with the combination therapy/4/.

## REFERENCES

- Pfizer Inc. Pfizer Sees Strong Prospects from the Industry's Premier R&D Pipeline and Expanding New Product Opportunities. Media Release. : 30 Nov 2004. Available from: URL: http://www.pfizer.com. (English).
- 2. Hu-Lowe DD, Grazzini ML. Significant enhancement of anti-tumor efficacy of VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736 in combination with docetaxel in chemo-refractory and/or orthotopic xenograft tumor models in mice. 96th Annual Meeting of the American Association for Cancer Research. 46: 475-476, Apr 2005. (English).
- 3. Herbst R, Rugo H, et al. A phase I study of the VEGF/PDGF receptor tyrosine kinase inhibitor AG-013736 in patients with advanced solid tumors: safety, pharmacokinetics, and dceMRI. AACR-NCI-EORTC International Conference on Molecular Targets and Cancer Therapeutics 2003.: 246, 17 Nov 2003. (English).
- 4. Rugo HS, Stopeck A, et al. A phase I/II study of AG-013736, an oral

anti-angiogenesis agent, in combination with docetaxel in patients with metastatic breast cancer. Breast Cancer Research and Treatment. 94 (Suppl. 1): 62 (plus poster) abstr. 1067, 2005. (English). 801029751

- 5. Hu-Lowe D, Heller D, et al. Pharmacological activites of AG013736, a small molecule inhibitor of VEGF/PDGR receptor tyrosine kinases. 93rd Annual Meeting of the American Association for Cancer Research. 43: 1082, Mar 2002. (English). 800883358
- 6. Rini B, Rixe O, et al. AG-013736, a multi-target tyrosine kinase receptor inhibitor, demonstrates anti-tumor activity in a phase 2 study of cytokine-refractory, metastatic renal cell cancer. Journal of Clinical Oncology. 23 (Suppl.): 380 (plus oral presentation) abstr. 4509, No. 16, Part I, 1 Jun 2005. (English). 801011782

L23 ANSWER 21 OF 22 WPIX COPYRIGHT 2006 THE THOMSON CORP on STN

ACCESSION NUMBER: 2006-253267 [26] WPIX

CROSS REFERENCE: 2006-293183 [30]; 2006-293404 [30]

DOC. NO. CPI: C2006-082484

TITLE: Pharmaceutical composition, useful for the prevention and

treatment of cancer, comprises sulfonamide compound and

angiogenesis inhibitor.

DERWENT CLASS: B05

INVENTOR(S): OWA, T; OZAWA, Y; SEMBA, T

PATENT ASSIGNEE(S): (EISA) EISAI CO LTD

COUNTRY COUNT: 111

PATENT INFORMATION:

PATENT NO KIND DATE WEEK LA PG MAIN IPC

WO 2006030947 A1 20060323 (200626)\* JA 258 A61K031-403

RW: AT BE BG BW CH CY CZ DE DK EA EE ES FI FR GB GH GM GR HU IE IS IT KE LS LT LU LV MC MW MZ NA NL OA PL PT RO SD SE SI SK SL SZ TR TZ

UG ZM ZW

W: AE AG AL AM AT AU AZ BA BB BG BR BW BY BZ CA CH CN CO CR CU CZ DE

DK DM DZ EC EE EG ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG

KM KP KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX MZ NA NG NI

NO NZ OM PG PH PL PT RO RU SC SD SE SG SK SL SM SY TJ TM TN TR TT

TZ UA UG US UZ VC VN YU ZA ZM ZW

APPLICATION DETAILS:

PATENT NO KIND APPLICATION DATE
WO 2006030947 A1 WO 2005-JP17238 20050913

PRIORITY APPLN. INFO: JP 2005-54475 20050228; US

2004-609452P 20040913; JP

2005-54150 20050228

INT. PATENT CLASSIF.:

MAIN: A61K031-403; A61K031-404

SECONDARY: A61K031-18; A61K031-381; A61K031-498; A61K031-63;

A61K031-635; A61K031-64; A61K039-395; A61K045-00;

A61P009-00; A61P035-00

BASIC ABSTRACT:

WO2006030947 A UPAB: 20060510

NOVELTY - A pharmaceutical composition comprises one or more sulfonamide compound (A) of specified formula and a component (B) which inhibits

angiogenesis.

DETAILED DESCRIPTION - A pharmaceutical composition comprises one or more sulfonamide compound (A) of specified formula and a component (B) which inhibits angiogenesis.

(A) is one or more compound of formula (I)-(IV) or their salts or solvates.

E = O, N(CH3), CH2, CH2CH2, or CH2O;

D = CH2 or O;

R1a = H or halo;

R2a = halo or CF3;

J = 0 or NH;

R1b = H, halo, nitro, azido, OSO2CH3, N(CH3)2, OH, pyridyl, thienyl, furyl, quinolinyl or triazole; or 1-6C alkyl, 1-4C alkoxy, 1-4C alkylthio, 2-5C alkoxycarbonyl or phenyl (all optionally substituted);

R2b = H, halo, CN, or 1-6C alkyl, 1-4C alkoxy, 2-5C alkoxycarbonyl, phenyl or quinolinyl (all optionally substituted);

R3b = H or optionally substituted 1-4C alkoxy;

R4b = H or 1-6C alkyl (provided that at least one of R3b and R3c is H):

R5b = H, halo, optionally substituted 1-6C alkyl or NO2;

R6b = H, halo, or 1-6C alkyl (provided that when R6b is optionally substituted 1-6C alkyl, then R5b is H and R7b is halo)

R7b = halo or optionally substituted 1-6C alkyl (provided that when one of R5b and R7b is optionally substituted 1-6C alkyl, or R7b is halo or optionally substituted 1-6C alkyl, then one of R5b and R6b is H).

INDEPENDENT CLAIMS are also included for:

- (1) pharmaceutical compositions comprising:
- (a) a combination of a sulfonamide compound of formula (IX) or its salts or solvates and (B);
- (b) a combination of a sulfonamide compound of formula (XIV) or its salts or solvates and one of 19 named VEGF receptor kinase inhibitor compounds (B10)-(B28);
- (c) a combination of (IX) and the VEGF receptor kinase 4-(3-chloro-4-(cyclopropylaminocarbonyl)aminophenoxy)-7-methoxy-6-quinoline carboxamide (B') or its salt or solvate; and
- (d) a pharmaceutical composition containing a sulfonamide compound(I)-(IV), (IX) or (XIV) for administration together with a angiogenesis inhibitor;
- (2) A kit containing at least one of a package container, explanation sheet and package insert sheet which record the combined use of (A) and (B); and
- (3) A kit containing a set formed of a formulation containing (A) and a formulation containing (B).

Ring A = optionally substituted mono- or bi- cyclic aromatic ring;

Ring B = optionally substituted 6-membered ring which is unsaturated carbocycle or containing 1 N as heteroatom;

Ring C = optionally substituted 5-membered heterocycle containing 1-2N;

W = bond or CH=CH;

X = N(R1) or O;

Y = C(R3) or N;

Z = NR2;

R1-R3 = H or lower alkyl;

ACTIVITY - Cytostatic; Antiangiogenic.

Cells of the human kidney cancer strain 786-0 were transplanted subcutaneously into nude mice. After 7 days, the mice were treated with 100mg/kg N-(3-cyano-4-methyl-1H-indol-7-yl)-3-cyanobenzene sulfonamide (E7820) twice daily and/or 100 mg/kg 4-(3-chloro-4-

(cyclopropylaminocarbonyl) aminophenoxy) -7-methoxy-6-quinoline carboxamide (B') once daily for 2 weeks. The volume of the tumors was measured at the

start of treatment and at the end of treatment, (day 22), and the ratio (volume at end of treatment)/(volume at start of treatment) was determined. Ratio was 1.61 for untreated control; 0.80 with E7820 alone; 0.59 with (B') alone; and 0.16 with E7820 + (B'); p less than 0.01 (calculated by two-way ANOVA).

MECHANISM OF ACTION - VEGF receptor kinase inhibitor; FGF receptor kinase inhibitor.

USE - The combinations and kits are used as a method of inhibiting angiogenesis and treating cancer (claimed), in the prevention, treatment, prevention of recurrence, and inhibition of metastasis of cancer, including carcinoma, myoma and melanoma, in mammals including humans. IMC-1121b, IMC-18F1, IMC-1C11 and IMC-2C6.

ADVANTAGE - The combinations have synergistic effect.

Dwg.0/8

FILE SEGMENT: CPI

FIELD AVAILABILITY:

AB; GI; DCN

MANUAL CODES:

CPI: B04-G04; B04-G21; B06-H; B07-B01; B07-D04C; B10-A08;

B10-A13D; B14-D06C; B14-F02F2; B14-H01; B14-S09;

B14-S18

TECH

UPTX: 20060421

TECHNOLOGY FOCUS - PHARMACEUTICALS - Preferred composition: (B) is a VEGF receptor kinase inhibitor or FGF receptor kinase inhibitor.

L23 ANSWER 22 OF 22 WPIX COPYRIGHT 2006 THE THOMSON CORP on STN

ACCESSION NUMBER:

2005-701891 [72] WPIX

DOC. NO. CPI:

C2005-213419

TITLE:

Treatment of abnormal cell growth e.g. cancer involves administering a combination of selective cyclin-dependent kinase inhibitor and at least one signal transduction

inhibitor.

DERWENT CLASS:

B05

INVENTOR(S):

ECK, S L; FRY, D W; LEOPOLD, J A; LEOPOLD, J A S

PATENT ASSIGNEE(S):

(PFIZ) PFIZER INC; (PFIZ) PFIZER PROD INC

COUNTRY COUNT:

109

PATENT INFORMATION:

PATENT	ИО		1	KINI	D DA	ATE		WI	EEK		LA	]	PG I	MAIN	III	PC						
US 200	5222	2163	3	A1	200	510	006	(20	005	72)	*		31	A61	K0	31-5	519					
WO 200	5094	1830	)	Α1	200	0510	13	(20	005	72)	Eì	V		A61	.K03	31-5	519					
RW:	AT	BE	BG	BW	CH	CY	CZ	DΕ	DK	EΑ	EΕ	ES	FI	FR	GB	GH	GM	GR	HU	ΙE	IS	IT
	KE	LS	LT	LU	MC	MW	ΜZ	NA	NL	OA	PL	PT	RO	SD	SE	SI	SK	$\operatorname{\mathtt{SL}}$	SZ	TR	TZ	UG
	ZM	zw																				
W:	ΑE	AG	AL	AM	ΑT	AU	AZ	BA	BB	BG	BR	BW	BY	BZ	CA	CH	CN	CO	CR	CU	CZ	DE
	DK	DM	DZ	EC	ΕE	EG	ES	FI	GB	GD	GE	GH	GM	HR	HU	ID	IL	IN	IS	JΡ	KE	KG
	ΚP	KR	ΚZ	LC	LK	LR	LS	LT	LU	LV	MA	MD	MG	MK	MN	MW	MX	ΜZ	NA	NI	NO	NZ
	OM	PG	PH	PL	PT	RO	RU	SC	SD	SE	SG	SK	$\operatorname{SL}$	SM	SY	TJ	TM	TN	TR	TT	TZ	UA
	UG	US	UZ	VC	VN	YU	$z_{A}$	ZM	ZW													

## APPLICATION DETAILS:

PATENT NO	KIND	APPLICATION	DATE
US 2005222163	Al Provisional	US 2004-557623P	20040330
WO 2005094830	A1	WO 2005-IB720	20050338

PRIORITY APPLN. INFO: US 2004-557623P 20040330; US 2005-95442 20050330

Page 54 Gembeh 10/816242

INT. PATENT CLASSIF.:

MAIN: A61K031-519 JDARY: A61K031-166; A61P035-00 SECONDARY:

BASIC ABSTRACT:

US2005222163 A UPAB: 20051109

NOVELTY - Treating abnormal cell growth in a patient involves administering a combination of selective cyclin-dependent kinase (CDK) inhibitor and at least one signal transduction inhibitor.

DETAILED DESCRIPTION - An INDEPENDENT CLAIM is included for a pharmaceutical composition comprising 6-acetyl-8-cyclopentyl-5-methyl-2-(5piperazin-1-yl-pyridin-2-ylamino)-8H-pyrido(2,3-d)pyrimidin-7-one (A1) or its isethionate salt and at least one signal transduction inhibitor selected from tyrosine kinase inhibitors, mitogen-activated protein kinase (MAP)/extracellular signal regulated kinase (ERK) (MEK) inhibitors, bcr-abl tyrosine kinase inhibitors, platelet-derived growth factor receptor (PDGFR) inhibitors, c-Kit inhibitors, erbB inhibitors, vasculature epidermal growth factor receptor (VEGF-R) inhibitors, 90-kDa heat shock protein (Hsp 90) inhibitors, Aurora kinase inhibitors, Fms-like tyrosine kinase-3 (FLT-3) inhibitors, n-Ras inhibitors, phosphatidylinositol-3 (PI3) kinase inhibitors, Raf kinase inhibitors, Akt inhibitors, mammalian targret of rapamycin (mTOR) inhibitors and/or multitargeted kinase inhibitors.

ACTIVITY - Cytostatic; Neuroprotective; Vasotropic; Antiinflammatory; Angiogenesis-inhibitor. Test details are described but no results are qiven.

MECHANISM OF ACTION - Tumor cell growth inhibitor.

USE - For treating abnormal cell growth in a patient (claimed), for treating cancer e.g. lung cancer, bone cancer, ovarian, breast or skin cancer; also for treating other disorders e.g. neuronal, glial, glandular, macrophagal or epithelial disorders, restenosis, or inflammatory, angiogenic and immunological disorders.

ADVANTAGE - The combination of CDK inhibitor and signal tranduction inhibitors produces a direct effect on the signaling pathways that promote growth, proliferation and survival of a cell and is effective in treating abnormal cell growth, preferably cancer.

Dwq.0/0 FILE SEGMENT: CPI FIELD AVAILABILITY: AB; DCN

MANUAL CODES: CPI: B02-B; B02-D; B04-B03D; B05-A03B; B05-B01J; B06-H;

B07-H; B10-A10; B10-A13D; B10-A18; B10-B03B;

B14-C03; B14-F01; B14-F02; B14-G03; B14-H01; B14-J01

TECH UPTX: 20051109

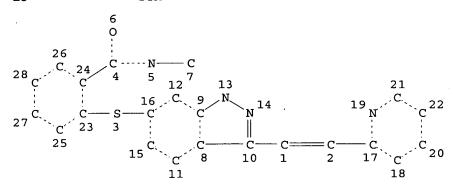
TECHNOLOGY FOCUS - PHARMACEUTICALS - Preferred Compositions: When the CDK inhibitor is CDK-4/6 inhibitor (A1), then the signal transduction inhibitor(s) is selected from MEK inhibitor; or Raf kinase inhibitor, Akt inhibitor and/or mTOR inhibitor; or Raf kinase or mTOR inhibitor; or bcr-abl tyrosine, PDGF-R, c-Kit, erbB, VEGF-R, FGFR and/or IGF1-R inhibitor; or PDGFR, erbB, or VEGF-R inhibitor; or multi-targeted kinase inhibitor. Preferred Components: The CDK inhibitor is CDK-4, CDK-6 or CDK4/6 inhibitor. CDK-4/6 inhibitor is (A1). MEK inhibitor is selected from 2-(2-chloro-4-iodo-phenylamino)-N-cyclopropylmethoxy-3,4-difluorobenzamide or N-((R)-2,3-dihydroxy-propoxy)-3,4-difluoro-2-(2-fluoro-4-iodophenylamino) -benzamide. Raf kinase or mTOR inhibitor is selected from BAY 43-9006, rapamycin, CCI 779, Rad001 or Arry 142886. PDGFR, erbB, or VEGF-R inhibitor is selected from CP-868596, ST-1571, PTK-787, PKC-412, Herceptin (trastuzumab), Erbitux, Iressa (gefitinib), Tarceva (erlotinib), EKB-569, PKI-166, GW-572016, E-2-methoxy-N-(3-(4-(3-methyl-4-(6-methyl-pyridin-3yloxy)-phenylamino)-quinazolin-6-yl)-allyl)-acetamide, CI-1033, CP-547632, ZD-6474, or Avastin (Bevacizumab). A multi-targeted kinase inhibitor is SU11248 or Gleevec. Preferred Method: The method further involves

administering at least one additional therapeutic agent selected from an antitumor agent, alkylating agent, antimetabolite, antibiotic, plant-derived antitumor agent, camptothecin derivative, interferon or a biological response modifier (preferably cis-platin, oxaliplatin, carboplatin, cyclophosphamide, 5-fluorouracil, capecitabine, cytosine, arabinosid, hydroxyurea, N-(5-(N-(3,4-dihydro-2-methyl-4-oxoquinazolin-6-ylmethyl)-N-methylamino)-2-thenoyl)-L-glutamic acid, adriamycin, bleomycin, interferon, nolvadex (tamoxifen), or casodex (4'-cyano-3-(4-fluorophenylsulfonyl)-2-hydroxy-2-methyl-3'- (trifluoromethyl)propionanilide).

FILE 'HOME' ENTERED AT 12:25:15 ON 10 AUG 2006

This Page Blank (uspto)

=> d stat que 17; d his nofile STR L5



NODE ATTRIBUTES:

DEFAULT MLEVEL IS ATOM DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

RING(S) ARE ISOLATED OR EMBEDDED

NUMBER OF NODES IS 28

STEREO ATTRIBUTES: NONE

3 SEA FILE=REGISTRY FAM FUL L5 L7

100.0% PROCESSED 21 ITERATIONS

3 ANSWERS

SEARCH TIME: 00.00.01

(FILE 'HOME' ENTERED AT 12:08:47 ON 10 AUG 2006)

FILE 'CAPLUS' ENTERED AT 12:08:54 ON 10 AUG 2006

E US2004-816242/APPS

L1 1 SEA ABB=ON US2004-816242/AP

D SCAN

SEL RN

FILE 'REGISTRY' ENTERED AT 12:09:30 ON 10 AUG 2006

5 SEA ABB=ON (108334-68-5/BI OR 114977-28-5/BI OR 319460-85-0/BI L2 OR 771570-72-0/BI OR 80449-01-0/BI)

D SCAN

L3 2 SEA ABB=ON L2 AND BENZAMIDE

D SCAN

L4 1 SEA ABB=ON L2 AND C22 H18 N4 O S/MF

D IDE

L5 STR 319460-85-0 L6

O SEA FAM SAM L5

L7 3 SEA FAM FUL L5

SAVE TEMP L7 GEM242FAM/A

FILE 'CAPLUS' ENTERED AT 12:12:05 ON 10 AUG 2006

Г8 17 SEA ABB=ON L7

FILE 'STNGUIDE' ENTERED AT 12:13:04 ON 10 AUG 2006

```
Gembeh 10/816242 searth history - Page 2
    FILE 'MEDLINE, DRUGU, IPA, WPIX, BIOSIS, EMBASE' ENTERED AT 12:14:56 ON
     10 AUG 2006
             44 SEA ABB=ON FREDDO J?/AU
L9
           2512 SEA ABB=ON HU LOWE D?/AU OR HULOWE D?/AU OR LOWE D?/AU
L10
             81 SEA ABB=ON KERSI PITHAVALA Y?/AU OR PITHAVALA Y?/AU
L11
             17 SEA ABB=ON STEINFELDT H?/AU
L12
             1 SEA ABB=ON L9 AND L10 AND L11 AND L12
L13
             13 SEA ABB=ON (L9 AND (L10 OR L11 OR L12)) OR (L10 AND (L11 OR
L14
                L12)) OR (L11 AND L12)
     FILE 'MEDLINE, DRUGU, IPA, WPIX, BIOSIS, EMBASE' ENTERED AT 12:16:27 ON
     10 AUG 2006
               D QUE L14
     FILE 'CAPLUS' ENTERED AT 12:16:28 ON 10 AUG 2006
               D QUE L1
     FILE 'CAPLUS, MEDLINE, DRUGU, WPIX, BIOSIS, EMBASE' ENTERED AT 12:16:38
     ON 10 AUG 2006
L15
             9 DUP REM L1 L14 (5 DUPLICATES REMOVED)
                     ANSWER '1' FROM FILE CAPLUS
                     ANSWERS '2-4' FROM FILE MEDLINE
                     ANSWERS '5-8' FROM FILE DRUGU
                     ANSWER '9' FROM FILE BIOSIS
                D IBIB ED ABS 1
                D IALL 2-9
     FILE 'REGISTRY' ENTERED AT 12:17:06 ON 10 AUG 2006
                D STAT QUE L7
                D IDE L7 1-3
     FILE 'REGISTRY' ENTERED AT 12:17:39 ON 10 AUG 2006
                SET TERMSET E#
                DEL SEL Y
                SEL L7 3 RN
              1 SEA ABB=ON 319460-85-0/RN
L16
                SET TERMSET LOGIN
     FILE 'PHAR' ENTERED AT 12:17:44 ON 10 AUG 2006
              1 SEA ABB=ON L16
L17
                SET LINE 250
                SET DETAIL OFF
                SET LINE LOGIN
                SET DETAIL LOGIN
                D SCAN
                D TRIAL
     FILE 'STNGUIDE' ENTERED AT 12:18:13 ON 10 AUG 2006
     FILE 'CAPLUS' ENTERED AT 12:21:01 ON 10 AUG 2006
             17 SEA ABB=ON L7
L18
             16 SEA ABB=ON L18 NOT L1
L19
     FILE 'IPA, TOXCENTER, PROUSDDR, PHAR, ADISINSIGHT' ENTERED AT 12:21:34 ON
     10 AUG 2006
L20
             19 SEA ABB=ON L7
     FILE 'WPIX' ENTERED AT 12:21:49 ON 10 AUG 2006
```

Searched by Barb O'Bryen, STIC 2-2518

E AXITINIB/CN

1 SEA ABB=ON AXITINIB/CN

L21

D SDCN DCSE

L22 11 SEA ABB=ON RA3G48/DCN OR 366778-0-0-0/DCRE OR AXITINIB/BI,ABEX OR AG013736/BI,ABEX OR AG 013736/BI,ABEX

D TRIAL 1-11

FILE 'WPIX' ENTERED AT 12:24:12 ON 10 AUG 2006 D QUE L22

FILE 'CAPLUS, IPA, TOXCENTER, PROUSDDR, PHAR, ADISINSIGHT, WPIX' ENTERED AT 12:24:22 ON 10 AUG 2006

22 DUP REM L19 L20 L22 (24 DUPLICATES REMOVED)

ANSWERS '1-16' FROM FILE CAPLUS

ANSWER '17' FROM FILE TOXCENTER

ANSWER '18' FROM FILE PROUSDDR

ANSWER '19' FROM FILE PHAR

ANSWER '20' FROM FILE ADISINSIGHT

ANSWERS '21-22' FROM FILE WPIX

D IBIB ED ABS HITSTR 1-16

D IALL 17-18

D ALL 19

L23

D IALL 20

D IALL ABEQ TECH 21-22

FILE 'HOME' ENTERED AT 12:25:15 ON 10 AUG 2006 D STAT QUE L7 This Page Blank (uspto)